NOTICE OF DETERMINATION
Marin County Environmental Coordination and Review

FILED

OCT 22 2007

MICHAEL J. SMITH
MARIN COUNTY CLERK
By: J. Whitney, Deputy

TO: ☒ Office of Planning and Research
☒ County Clerk, County of Marin

FROM: Marin County Department of Public Works
(Lead Agency)

SUBJECT: Filing of Notice of Determination in compliance with Section 21108 or 21152 of the Public Resources Code.

Project Title: Easkoot Creek Sediment Removal at Bridget Crossings
State Clearinghouse # 2007-092065
Contact Person: Kallie Kull, Senior Planner
Assessor's Parcel: N/A **Application: Sediment Removal**

Project Location: The project area is on Easkoot Creek, which runs through the town of Stinson Beach and discharges into the Bolinas Lagoon downstream of Calle del Arroyo. Driving directions; From Highway 101, just north of the Golden Gate bridge in San Francisco, take the Highway 1 north exit towards Mill Valley/Stinson Beach. Stay straight on Highway 1, veering right as needed to the Town of Stinson Beach (approximately 12 miles). Proceed north on Highway One and at the north end of town to find the intersections of the Calles with Highway 1. Turn left on the individual Calles to the bridges and project sites that cross Easkoot Creek.

Project Description: Sediment will be removed from the creek channel immediately upstream and downstream of six bridge crossings of Easkoot Creek with Arenal Ave., Calle del Pinos. Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo. The area to be dredged will be no more than 400 square feet at each crossing, extending no more than 20 feet up or downstream from the bridge crossings and the amount of material removed will be no more than 20 cubic yards per crossing. The project will take place during late summer, no later than Oct. 31, at times of lowest water, so as to minimize any potential impact on salmon and steelhead that may be present in the project area. Should any fish be present on site, a State and/or NMFS certified fisheries biologist will be on-site to block net the creek and relocate the fish upstream. A creek biologist from the County will also be on-site the entire time during the project to ensure that the work is being done according to conditions set forth in the California Fish and Game 1600 Streambed Alteration Agreement conditions. All work will be done from the bank and no equipment will be placed in the creek. All sediment removed from the creek will be transported to a legal upland spoils disposal site.

This is to advise that the Marin County Department of Public Works Director approved the above-described project on October 19, 2007, and has made the following determinations regarding the above described project:

1. The project in its approved form will not have a significant effect on the environment.
2. A Negative Declaration was prepared for this project pursuant to the provisions of CEQA.
3. Mitigation measures were not made a condition of the approval of the project.
4. Findings were made pursuant to the provisions of CEQA.

I certify that a copy of the Negative Declaration of Environmental Impact, and record of project approval is on file and may be examined at:
Agency: Marin County Department of Public Works

Address: 3501 Civic Center Drive, Room 304
San Rafael, CA 94903-4112

By: _____
Farhad Mansourian, Director, Department of Public Works

Date: 10/22/07

The filing of this Notice of Determination starts a 30 day statute of limitations on court challenges to the approval under CEQA.

VII. PROJECT SPONSER'S INCORPORATION OF MITIGATION MEASURES:

Acting on behalf of the project sponsor or the authorized agent of the project sponsor, I (undersigned) have reviewed the Initial Study for the Easkoot Creek Sediment Removal, Stinson Beach, CA and have particularly reviewed the mitigation measures and monitoring programs identified herein. I accept the findings of the Initial Study, including the recommended mitigation measures, and hereby agree to modify the proposed project application4s now on file with Marin County to include and incorporate all mitigation measures and monitoring programs set out in this Initial Study.

Farhad Mansourian — 10-22-07

(Project Sponsor's Name or Representative) — Date

(Project Sponsor's Name or Representative) — Date

VII. DETERMINATION: Pursuant to Sections 15081 and 15070 of the State Guidelines, the foregoing Initial Study evaluation, and the entire administrative record for the project:

[X] I find that the proposed project WILL NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.

[ ] I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because the mitigation measures described on an attached sheet have been added to the project. A NEGATIVE DECLARATION will be prepared.

[ ] I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.

Signature T Haddad Date 9/13/07

Printed Name Tim Haddad Date September 13, 2007

MARIN COUNTY COMMUNITY DEVELOPMENT AGENCY
PLANNING DIVISION

INITIAL STUDY
Easkoot Creek Sediment Removal

I. BACKGROUND

A. Project Sponsor's Name and Address: Marin County Dept. of Public Works
3501 Civic Center Dr., Room 304
San Rafael, CA 94903

B. Lead Agency Name and Address: Marin County Dept. of Public Works
3501 Civic Center Dr., Room 304
San Rafael, CA 94903

C. Contact Person and Phone Number: Kallie Kull, Senior Planner, (415) 499-6532

II. PROJECT DESCRIPTION

A. Project Title: Easkoot Creek Sediment Removal

B. Type of Application(s): Flood Control Project

C. Project Location: Bridge crossings over Easkoot Creek on Arenal Ave., Calle del Pinos. Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo, within the Town of Stinson Beach.

D. General Plan Designation: The project site is located within the mapped Coastal Recreation Corridor of the Marin Countywide Plan (CWP) and has a land use designation of C-SF3 (Coastal, Single Family, one unit per one acre to five acres). The CWP Environmental Quality Element designates the Stinson Beach area as an important Environmental Corridor and Resource Conservation Area.

E. Zoning: C-MF2 1-4 units per acre

F. Description of Project:

Existing Project Site
The project area is on Easkoot Creek, which runs through the town of Stinson Beach and discharges into the Bolinas Lagoon downstream of its intersection Calle del Arroyo. Sediment will be removed from the creek channel immediately upstream and downstream of six bridge crossings of Easkoot Creek with Arenal Ave., Calle del Pinos. Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo. The area to be dredged will be no more than 400 square feet at each crossing, extending no more than 20 feet up or downstream from the bridge crossings and the amount of material removed will be no more than 20 cubic yards per crossing.

Background
In the early 1950's a large landslide occurred in a canyon just above Stinson Beach on Golden Gate National Recreation (GGNRA) lands, which deposited a vast amount of loose material in the bed of one of the tributaries to Easkoot Creek. This material began washing down the steep canyon and into the flat reach of Easkoot Creek, where it promptly deposited out, thereby greatly reducing the capacity of the

creek to convey high flows during winter storms. Thereafter, to maintain the channel capacity and reduce flooding in the town of Stinson Beach, accumulated sediment has been removed periodically from the creek by County Public Works, State Division of Beaches and Parks, and the Corps of Engineers. The creation of Marin County Zone 5 Flood Control District was based solely on this observed need for sediment removal from Easkoot Creek.

On January 1, 2006, a large quantity of sediment washed down into Easkoot Creek during the New Year's Eve flood, causing great concern for further flooding of the adjacent residences in the town of Stinson Beach. In October 2006, in order to address this concern, the County of Marin Public Works Department removed sediment from the channel under five bridge crossings of Easkoot Creek with Calle del Pinos, Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo. The objective of this work was to increase channel capacity and thereby reduce the potential frequency of flooding. This work, completed in October 2006 was permitted under a California State Fish and Game 1600 Streambed Alteration Agreement, with a Statutory Exemption under CEQA Section 15269 Emergency Projects as per declaration of the site as a disaster area by the Governor of California.

Proposed Project Description

Since October 2006, sediment has continued to wash down into the creek channel from the upper landslide into the already severely aggraded channel. The Marin County Flood Control Zone 5 Advisory Board has requested, and the community expressed a need for, the County Public Works crews to remove accumulated sediment in the channel before the 2007-2008 rainy season begins. The objective of the proposed work is to lower the aggraded channel bed and increase flow capacity at the bridge crossings during high storm events. The County of Marin Public Works Department is proposing to remove sediment at six locations, under the bridge crossings of Easkoot Creek with Arenal Ave., Calle del Pinos, Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo. The proposal is for a one year sediment removal effort coupled with monitoring by Marin County Water Conservation and Flood Control District, to assess the effectiveness of this activity on channel bed elevation and flood flow capacity.

The following conditions will be met during the proposed sediment removal project:

- The project will take place during late summer, no later than Oct. 31, at times of lowest water, so as to minimize any potential impact on salmon and steelhead that may be present in the project area. Should any fish be present on site, a State and/or NMFS certified fisheries biologist will be on-site to block net the creek and relocate the fish upstream. A creek biologist from the County will also be on-site the entire time during the project to ensure that the work is being done according to conditions set forth in the California Fish and Game 1600 Streambed Alteration Agreement conditions.

- Sediment removal will take place only immediately upstream and downstream of the crossings of Easkoot Creek with Arenal Ave., Calle del Pinos, Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo. Work will begin at the lowest crossing, moving upstream, to minimize the effects of turbidity on upstream reaches.

- All work will be done from the bank and no equipment will be placed in the creek.

- At each location the total area involved, both up and downstream, will be no more than 400 square feet, extending no more than 20 feet up or downstream from the bridge crossing, and the amount of material removed will be no more than 20 cubic yards per crossing.

- All sediment removed from the creek will be transported to a legal upland spoils disposal site.

- The Marin County Water Conservation and Flood Control District, will conduct monitoring to assess the effectiveness of this activity on channel bed elevation and flood flow capacity.

- The overall impact to the channel in the project reach will be monitored by staff of the Marin County Flood Control District, who will collect channel topography data in order to access whether sediment removal on an annual basis is warranted for flood control purposes. Changes in channel morphology will be documented at three points in time: 1) before any sediment removal has occurred, 2) immediately after the work has been completed and before the onset of winter storms, and 3) following the winter rainy season of 2007-2008.

- A long term, comprehensive solution to the flooding issue in the Community of Stinson Beach is being developed by the County of Marin Flood Control District in collaboration with the Community of Stinson Beach and the Golden Gate National Recreation Area.

III. CIRCULATION AND REVIEW

A. Responsible Agencies: *(agencies whose approval is required and permits needed)*

- California Department of Fish and Game- 1600 Streambed Alteration Agreement

DOCUMENTS INCORPORATED BY REFERENCE

1) Marin Countywide Plan, CDA- Planning Division (1994)

2) Easkoot Creek Restoration at Stinson Beach- Environmental Assessment U.S. Dept of the Interior National Park Service; Golden Gate National Recreation Area.

3) California Department of Fish and Game Streambed Alteration Agreement for Sediment Removal in Easkoot Creek (October 2006)

4) Conversation with Jeremy Sarrow, Department of Fish and Game biologist. August 22, 2007

5) National Marine Fisheries Service Protected Resources- Marin County database.

IV. EVALUATION OF ENVIRONMENTAL IMPACTS AND MITIGATION MEASURES

Pursuant to Section 15063 of the State CEQA Guidelines, and the County EIR Guidelines, Marin County will prepare an Initial Study for all projects not categorically exempt from the requirements of CEQA. The Initial Study evaluation is a preliminary analysis of a project which provides the County with information to use as the basis for deciding whether to prepare an Environmental Impact Report (EIR) or Negative Declaration. The points enumerated below describe the primary procedural steps undertaken by the County in completing an Initial Study checklist evaluation and, in particular, the manner in which significant environmental effects of the project are made and recorded.

A. The determination of significant environmental effect is to be based on substantial evidence contained in the administrative record and the County's environmental database consisting of factual information regarding environmental resources and environmental goals and policies relevant to Marin County. As a procedural device for reducing the size of the Initial Study document, relevant information sources cited and discussed in topical sections of the checklist evaluation are incorporated by reference into the checklist (e.g. general plans, zoning ordinances). Each of these information sources has been assigned a number which is shown in parenthesis following each topical question and which corresponds to a number on the data base source list provided herein as Attachment 1. See the sample question below. Other sources used or individuals contacted may also be cited in the discussion of topical issues where appropriate.

B. In general, a Negative Declaration shall be prepared for a project subject to CEQA when either the Initial Study demonstrates that there is no substantial evidence that the project may have one or more significant effects on the environment. A Negative Declaration shall also be prepared if the Initial Study identifies potentially significant effects, but revisions to the project made by or agreed to by the applicant prior to release of the Negative Declaration for public review would avoid or reduce such effects to a level of less than significance, and there is no substantial evidence before the Lead County Department that the project as revised will have a significant effect on the environment. A signature block is provided in Section VII of this Initial Study to verify that the project sponsor has agreed to incorporate mitigation measures into the project in conformance with this requirement.

C. All answers to the topical questions must take into account the whole of the action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts. Significant unavoidable cumulative impacts shall be identified in Section VI of this Initial Study (Mandatory Findings of Significance).

D. A brief explanation shall be given for all answers except "Not Applicable" answers that are adequately supported by the information sources the Lead County Department cites in the parenthesis following each question. A "Not Applicable" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g. the project falls outside a fault rupture zone). A "Not Applicable" answer shall be discussed where it is based on project-specific factors as well as general standards (e.g. the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).

E. "Less-than-significant Impact" is appropriate if an effect is found to be less-than-significant based on the project as proposed and without the incorporation of mitigation measures recommended in the Initial Study.

F. "Potentially Significant Unless Mitigated" applies where the incorporation of recommended mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less-than-significant Impact." The Lead County Department must describe the mitigation measures, and briefly explain how they reduce the effect to a less-than-significant level (mitigation measures from Section V, "Earlier Analyses", may be cross-referenced).

G. "Significant Impact" is appropriate if an effect is significant or potentially significant, or if the Lead County Department lacks information to make a finding that the effect is less-than-significant. If there are one or more effects which have been determined to be significant and unavoidable, an EIR shall be required for the project.

H. The answers in this checklist have also considered the current California Environmental Quality Act Guidelines and the Initial Study Checklist contained in those Guidelines.

V. ISSUES (and Supporting Information Sources, see Attachment A)):

1. LAND USE AND PLANNING. *Would the proposal:*

a) **Conflict with applicable Countywide Plan designation or zoning standards? (source #(s):** Countywide Plan (1994)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

The determinations of policy consistency as discussed in this Initial Study section represent County staff interpretation of policies. However, this Initial Study does not determine policy consistency. The County decision-makers make the formal policy consistency determinations.

Policy inconsistencies may not necessarily indicate significant environmental effects. Section 15358(b) of the CEQA Guidelines states that "effects analyzed under CEQA must be related to a physical change in the environment." Therefore, only those policy inconsistencies that would lead to a significant effect on the physical environmental are considered significant impacts pursuant to CEQA. Where potentially significant environmental impacts are raised in the discussion below, they have been mitigated to a less-than-significant impact and, therefore, project activities are determined to be consistent with the relevant policies cited. Mitigations are addressed further in the topical impact sections following plan policy analyses.

LOCAL PLANS, POLICIES, AND REGULATIONS

Land use designations and development of the project site are governed by the objectives and policies of the Marin Countywide Plan (CWP), the Local Coastal Program (LCP), Unit I, the Stinson Beach Community Plan (Community Plan), and Title 22 (Zoning) of the Marin County Code.

The proposed project is maintenance in nature, and will not change the Land Use Designations at the project site or conflict with zoning standards or the objectives of the above mentioned plans in any way, therefore the project will be consistent with Applicable Countywide Plan designation or zoning standards.

b) **Conflict with applicable environmental plans or policies adopted by Marin County?** Countywide Plan (1994)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The Marin Countywide Plan

Specific Countywide Plan policies which pertain to the proposed project include the following subjects:
(1) Protection of riparian systems; (Policy EQ-2.1)
(2) Protection of Stream Conservation Areas; (Policies EQ 2.2, 2.4, 2.5, 2.11)
(3) Species and habitat preservation; (Policies EQ-2.87, 2.88, 3.6)
(4) Prevention of air, water, and noise pollution; (Policy EQ 3.2)
(5) Avoidance of hazards; (Policy EQ- 3.7)
(6) Protection of trees; (Policy EQ 3.14)
(7) Minimization of grading activities; (Policy EQ-3.16)
(8) Protection of archeological resources; (Policy EQ-3.29)
(9) Compliance with the Stinson Beach Community Plan and Local Coastal Program elements.

1) Protection of Riparian Systems

Policy EQ-2.1 Value of Riparian Systems. Riparian systems, streams and their riparian and woodland habitat are irreplaceable and should be officially recognized and protected as essential environmental resources, because of their values for erosion control, water quality, fish and wildlife, aesthetics, recreation, and the health of human communities.

Consistent:
As discussed in Sections V. 4. (c) and V. 7. (a., b, c), the proposed sediment removal will be confined to the stream channel itself and all work will be conducted from the bridges and top of bank, avoiding encroachment into the riparian corridor. All native riparian vegetation will be protected and not disturbed by heavy equipment or dredging activities. A biologist from the County will be present at the project site during the operation to ensure that no heavy equipment enters into the riparian corridor and that all sediment removed from the channel is disposed of in an upland spoils storage site. Therefore the project will be consistent with Policy EQ-2.1.

(2) Protection of Stream Conservation Areas

Policy EQ-2.2, Streamside Conservation Areas; states that all perennial and intermittent streams, which are defined as natural watercourses shown as solid or dashed blue lines on the most recent appropriate USGS quad sheet, should be subject to stream and creekside protection policies. A perennial stream is further defined as: "a watercourse that flows throughout the year (except for infrequent or extended periods of drought), although surface water flow may be temporarily discontinuous in some reaches of the channel such as between pools."

Policy EQ 2.4 defines permitted land uses within the SCA, including:

- all currently existing structures and uses including reconstruction and repairs;
- necessary water supply projects
- flood control projects
- projects to improve fish and wildlife habitat
- grazing of livestock and other agricultural uses
- maintenance of water channels for erosion control and other purposes;
- road and utility crossings
- water monitoring installations
- trails

Consistent: Easkoot Creek is by definition a blue line stream (see attached USGS Quad map) and as such, is subject to protection under the Stream Conservation Area protection policies as set forth in the Countywide Plan. As discussed in V Section 3. (c) and V. 11. (d, e), the proposed project is a flood control project entailing maintenance of a water channel for flood control purposes, and thus is a permitted activity within the SCA, as set forth in the Countywide Plan EQ 2.4. Therefore the project will be consistent with Policy EQ-2.4.

Policy EQ-2.5 Prohibited Land Uses in Stream Conservation Areas (SCAs). The following new uses are prohibited in the SCA:

- roads and utility lines, except at crossings
- confinement of livestock
- dumping or disposal of refuse
- use of motorized recreational vehicles
- any structural improvement (excluding repairs) other than those identified in Policy EQ-2.4, including residences, barns, and storage buildings, unless allowed by a development permit in Policy EQ-2.6.

Consistent: The proposed project does not implement any of the activities listed as prohibited within the SCA. Therefore the project will be consistent with Policy EQ-2.5.

Policy EQ-2.11 Modifications of natural channels within SCAs for flood control, etc., should be done in a manner that retains and protects the vegetation forming ground cover and shade. Special attention should be given to the protection of riparian vegetation.

Consistent. As discussed in Section 3. (b, c), 4. (b, c), V. 7 (a, b, c), and V. 11 (d,e), all sediment removal will be confined to the stream channel itself and all work will be conducted from the bridges and top of bank, avoiding encroachment into the riparian corridor. All native riparian vegetation will be protected and not disturbed by heavy equipment or dredging activities. A biologist from the County will be present at the project site during the operation to ensure that no heavy equipment enters into the riparian corridor and that all sediment removed from the channel is disposed of in am upland spoils storage site. Therefore the project will be consistent with Policy EQ-2.11.

(3) Species and Habitat Preservation

Policy EQ-2.87 Species Preservation in the Environmental Review Process. Environmental review of development applications shall consider the impact of the proposed development on species and habitat diversity.

Policy EQ-2.88 Protection of Special Status Species. Development shall be restricted or modified in areas which contain special status species and migratory species of the Pacific Flyway and/or significant natural areas, wetlands, riparian habitats, and freshwater habitats, to ensure the continued health and survival of these species and areas

Policy EQ-3.6 Wildlife, Vegetation, and Habitats. A diversity and abundance of wildlife and marine life shall be maintained. Vegetation and animal habitats shall be preserved wherever possible.

Consistent: As discussed in detail in Sections V. 7 (a, b, c), the proposed project, will adhere to the conditions outlined in that section, ensuring that the project would have less-than-significant impacts on all special-status species, wildlife and habitat diversity. Therefore the project will be consistent with Policy EQ-2.87, 2.88, and 3.6.

(4) Prevention of Air, Water, and Noise Pollution

Policy EQ-3.2. Air, Water, and Noise Pollution. Air, water, and noise pollution shall be prevented or minimized.

Air Pollution
The affects on air quality are from exhaust coming from heavy equipment during dredging. The impacts are short term and temporal, lasting less than a week and moving between six different locations during that time. Consequently the proposed project is consistent with Policy EQ-3.2, and the proposed project would not result in potentially significant impacts on air quality.

Water Pollution
There will be a temporary increase in turbidity in the creek as sediment is disturbed from the dredging process. These impacts will be short-term and localized, expected to last less than a day in any one location. The work will begin at the most downstream crossing and continue upstream to minimize impacts to the aquatic environment from siltation. Given these circumstances, the impacts from siltation to the creek are expected to be less-than-significant.

Noise

The noise associated with sediment removal activities is limited to the sound of heavy equipment working during normal working hours. The project is short term (less than one week), and the work is located in the creek zone, a distance away from the nearest residence.

Consistent. As discussed in Sections 3. (b), V. 4 (b, c), and V. (a), The project would contribute minimally to air, water, and noise pollution to the extent analyzed in this Initial Study. No significant effects related to air, water, or noise pollution are identified. Therefore, the project would be consistent with this policy. Therefore the project will be consistent with Policy EQ- 3.2.

(5) Avoidance of Hazards

Policy EQ-3.7 Avoidance of Hazards from Earthquake, Erosion, Landslide, Floods, and Fires.

Consistent. As discussed in Section V. 3. (a)The project is maintenance in nature, lasting less than a week in duration, therefore the likelihood of impacts from an earthquake, flood or fire are minimal. The project will be implemented during the dry season, thus avoiding potential impacts from the landslide in the upper watershed. Since the project is a flood control project, removal of aggraded sediment should have a positive effect on the avoidance of flood flows into adjacent neighborhoods. Therefore the project will be consistent with Policy EQ-3.7.

(6) Protection of Trees

Policy EQ-3.14 Protection of Trees. The County shall strive to protect large trees, trees with historical importance, and oak woodland habitat, and prevent the untimely removal of trees through implementation of tree preservation ordinance.

Consistent. No large trees, trees with historic importance, or oak woodland habitat will be removed during the project. As discussed in Sections V. 4. (c) and V. 7. (a., b, c), the proposed sediment removal will be confined to the stream channel itself and all work will be conducted from the bridges and top of bank, avoiding encroachment into the riparian corridor. All native riparian vegetation will be protected and undisturbed by heavy equipment or dredging activities. Therefore the project will be consistent with Policy EQ- 3.14.

(7) Minimization of Grading Activities

Policy EQ-3.16. Minimize Excavation, Grading, and Filling. New development in the County shall adhere to the standards of the Department of Public Works in order to minimize excavating, grading, and filling, while allowing for adequate access.

Consistent. As discussed in Sections V. 3 (a, b, c), the objective of the proposed project is flood control only, and is not subject to a development or grading permit. However, the area to be excavated at each site is limited to no more than 400 square feet in area, extending no more than 20 feet up or downstream from the bridge crossing, and the amount of material removed will be no more than 20 cubic yards per crossing. This is the minimal area needed to clear the bridges of sediment aggradation, while not extending the dredging further up or downstream from the bridges. The excavated area will be confined to the channel bottom itself and will not encroach into the streamside area or impact native riparian vegetation in any way. Therefore the project is consistent with Policy EQ-3.16.

(8) Protection of Archeological Resources

Policy EQ-3.29. Review Sensitivity Maps. The Planning Department shall review the archaeological sensitivity map for all development applications in order to determine potential impacts.

Consistent. As discussed in Sections V. 14 (a, b), the proposed project will disturb only aggraded sediment that has been carried from the upper watershed down through the stream system, and the area to be dredged has been dredged numerous times before in the same locations, with no known artifacts found. Should any cultural resources be discovered during this round of dredging, all work shall immediately be stopped and the services of a qualified archaeologist from Sonoma State University Cultural Resources Department shall be engaged to assess the value of the resource and to develop appropriate mitigation measures. These measures will ensure that the proposed project would result in less-than-significant impacts to cultural resources and, therefore, be consistent with Policy EQ-3.29.

(9) Compliance with Local Community Plan and Local Coastal Program

Stinson Beach Community Plan (1985)

The Stinson Beach Community Plan contains specific goals, policies, and programs that govern conservation and development in the unincorporated community of Stinson Beach. The principle goals of the plan include the following:

THEREFORE THE FOLLOWING THREE GOALS ARE OF PARAMOUNT IMPORTANCE (Stinson Beach Community Plan 1984). :

a. The rural atmosphere and individualistic character of the town must be preserved as a prime consideration;
b. The relative safety, security, and privacy of the residents must be maintained and improved;
c. The Stinson Beach Village Association, a monitor organization, must actively pursue the general goals and specific policies of this plan and endeavor to represent the best interests of the town.

Consistent. The proposed project is consistent with the Stinson Beach Community Plan Goals (1985) as described below. The project serves to fulfill Goal #2, as a flood control project helping to maintain the relative safety and security of the residents of Stinson Beach. Therefore the proposed project would be consistent with all relevant Stinson Beach Community goals.

Local Coastal Program, Unit I

Consistent. The Countywide Plan specifies that land use in the Coastal Zone shall be subject to the provisions of the LCP in addition to the Countywide Plan land use designations (CWP Policy CD-8.10). As discussed above in Section V. 1 (a), the land use designations will not be altered because of this project, therefore the proposed project would be consistent with relevant policies in the Marin County Local Coastal Plan (LCP), Unit I.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Affect agricultural resources, operations, or contracts (e.g. impacts to soils or farmlands, impacts from incompatible land uses, or conflicts with Williamson Act contracts)? (source #(s): Countywide Plan (1994)	[ ]	[ ]	[ ]	[X]

The project does not involve nor is associated with any form of agricultural resources, operation or conflicts; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Disrupt or divide the physical arrangement of an established community (including a low-income or minority community)? (source #(s): Countywide Plan (1994)	[ ]	[ ]	[ ]	[X]

The nature of the project will not divide or affect the physical arrangement of the established community; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
e) Result in substantial alteration of the character or functioning of the community, or present or planned use of an area? (source #(s): Countywide Plan (1994)	[ ]	[ ]	[ ]	[X]

The nature of the project will not alter the character or function of the community and will actually be a benefit to the community by reducing the potential frequency of flooding, therefore, the project will result in less-than-significant impacts.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
f) Substantially increase the demand for neighborhood or regional parks or other recreational facilities, or affect existing recreational opportunities? (source #(s): Countywide Plan (1994)	[ ]	[ ]	[ ]	[X]

The project is maintenance in nature and will not increase demand for parks or other facilities; therefore this is a less-than-significant impact.

2. POPULATION AND HOUSING. ***Would the proposal:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Increase density that would exceed official population projections for the planning area within which the project site is located as set forth in the Countywide Plan and/or community plan? (source #(s): Countywide Plan (1994)	[ ]	[ ]	[ ]	[X]

The project will not have an effect on population due to the fact that it is maintenance in nature; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Induce substantial growth in an area either directly or indirectly (e.g. through projects in an undeveloped area or extension of major infrastructure)? (source #(s): Countywide Plan (1994)	[ ]	[ ]	[ ]	[X]

The project will not have an effect on growth due to the fact that it is maintenance in nature, consequently, the project will result in less-than-significant impacts.

c) **Displace existing housing, especially affordable housing?** **(source #(s):** Countywide Plan (1994)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

The project does not displace existing housing of any kind; therefore, the project will result in a less-than-significant impact.

3. **GEOPHYSICAL.** ***Would the proposal result in or expose people to potential impacts involving:***

a) **Location in an area of geologic hazards, including but not necessarily limited to: 1) active or potentially active fault zones; 2) landslides or mudslides; 3) slope instability or ground failure; 4) subsidence; 5) expansive soils; 6) liquefaction; 7) tsunami ; or 8) similar hazards?** **(source #(s):**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Review of resource maps maintained by the Marin County Community Development Agency indicate that the subject property is not located in an area of geologic hazards as indicated on Geologic Hazards Map for Unit I of the Local Coastal Program. In addition, the subject property is not located within the delineated boundaries of the San Andreas Fault zone as identified by the Alquist-Priolo Special Studies Zone Act. Consequently, the project will result in less-than-significant impacts.

b) **Substantial erosion of soils due to wind or water forces and attendant siltation from excavation, grading, or fill?** **(source #(s):**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only sediment that will be excavated is below water line and will be removed to a designated upland spoils location area, and thus will not be exposed to erosive forces such as wind or water. There will be no excavating or grading of adjacent streambanks, and no fill involved in the project. There will be a temporary increase in turbidity in the creek as sediment is disturbed from the dredging process. These impacts will be temporary and expected to last less than a day in any one location. The work will begin at the most downstream crossing and continue upstream to minimize impacts to the aquatic environment from siltation. Given these circumstances, the impacts from siltation to the creek are expected to be less-than-significant.

c) **Substantial changes in topography from excavation, grading or fill, including but not necessarily limited to: 1) ground surface relief features; 2) geologic substructures or unstable soil conditions; and 3) unique geologic or physical features?** **(source #(s)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

A localized change in channel topography will occur through the removal of sediment on both sides of the bridges in six locations. The long term objective of the project is to lower the channel bed elevation in the project reach to increase flow capacity and decrease the potential frequency of flooding. The County is

proposing to monitor channel conditions before and after the activity to assess whether this long term objective is being met. Given the nature of the project, the change in channel topography is a desired outcome. Given that the sediment to be removed is caused by deposition into the creek from the landslide in the upper watershed, the impact to the creek channel from excavation should be positive in nature. Consequently, the project will result in less-than-significant impacts.

4. WATER. ***Would the proposal result in*:**

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Substantial changes in absorption rates, drainage patterns, or the rate and amount of surface runoff? (source #(s):	[ ]	[ ]	[X]	[ ]

Drainage patterns and rate of surface run-off into the creek from the upper watershed and adjacent neighborhoods will remain unaltered. The removal of sediment from the channel will increase channel ability to carry surface run-off during high flood flows. If the channel has greater capacity, and the creek remains in its channel during high flows, the flooding pattern should improve in the adjacent Stinson Beach neighborhoods. Consequently, the project will result in less-than-significant impacts.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Exposure of people or property to water related hazards, including, but not necessarily limited to: 1) flooding; 2) debris deposition; or 3) similar hazards ? (source #(s):	[ ]	[ ]	[X]	[ ]

By removing sediment from the channel at each bridge crossing, the channel bed elevation will be lowered, thus improving flow capacity and decreasing the threat of potential flooding in adjacent neighborhoods. The project will also improve the passage of wood and other debris under the bridges, aiming to avoid flood hazards caused by debris deposition at the bridges during high flows. The overall impact of the project on flood hazards and debris deposition is a beneficial effect of the project. Consequently, the project will result in less-than-significant impacts.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Discharge of pollutants into surface or ground waters or other alteration of surface or ground water quality (e.g. temperature, dissolved oxygen or turbidity)? (source #(s):	[ ]	[ ]	[X]	[ ]

There will be a temporary increase in turbidity in the creek as sediment is disturbed from the dredging process. These impacts will be short-term and localized, expected to last less than a day in any one location. The work will begin at the most downstream crossing and continue upstream to minimize impacts to the aquatic environment from siltation. Any fish in the project area will have been relocated upstream before work begins, and thus not subject to turbid conditions. Given these circumstances, the impacts from siltation to the creek are expected to be less-than-significant.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Substantial change in the amount of surface water in any water body or ground water either through direct additions or withdrawals, or through intersection of an aquifer by cuts or excavations? (source #(s):	[ ]	[ ]	[X]	[ ]

The amount of surface water in the channel will remain unaltered. No addition or withdrawal will occur due to the project. Consequently, the project will result in less-than-significant impacts.

e) Substantial changes in the flow of surface or ground waters, including, but not necessarily limited to: 1) currents; 2) rate of flow; or 3) the course or direction of water movements? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The natural direction and rate of flow of the creek will remain unchanged. There may be a decrease in flood flows coming from the creek into the adjacent neighborhood, as the channel capacity is increased, which is the objective of the project. Therefore, this is a less-than-significant impact.

f) Substantial reduction in the amount of water otherwise available for public water supplies? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

The project will not reduce water supply amount, therefore, this is a less-than-significant impact.

5. AIR QUALITY. ***Would the proposal:***

a) Generate substantial air emissions that could violate official air quality standards or contribute substantially to an existing or projected air quality violation? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only air pollutants that will be produced will come from the exhaust fumes from the heavy equipment used for the project. Since the work will occur out in the open air and over a short duration (2-3 days), the impact on air quality will be less-than-significant. Consequently, the project will result in less-than-significant impacts.

b) Expose sensitive receptors to pollutants, such as noxious fumes or fugitive dust? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only air pollutants that will be produced will come from the exhaust fumes from the heavy equipment used for the project. Since the work will occur out in the open air and over a short duration (2-3 days), the impact to sensitive receptors will be less-than-significant.

c) Alter air movement, moisture, or temperature, or cause any change in climate? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

No alterations in climate will occur as a result of sediment removal activities, therefore, this is a less-than-significant impact.

d) Create objectionable odors? (source #(s): *Countywide Plan (1994)*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only odors that will be produced will come from the exhaust fumes from the heavy equipment used for the project. Since the work will occur out in the open air and over a short duration (2-3 days), the impact from objectionable odors will be less-than-significant.

6. TRANSPORTATION/CIRCULATION. ***Would the proposal result in:***

a) Substantial increase in vehicle trips or traffic congestion such that existing levels of service on affected roadways will deteriorate below acceptable County standards? (source #(s): Countywide Plan (1994)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Each bridge crossing may be temporarily closed for a limited number of hours during sediment removal activities. Ingress and egress to the neighborhood during sediment removal activities is available on adjacent streets within the Town of Stinson Beach. Alternative routes will be marked clearly with County of Marin traffic control signs. The level of service on affected roadways will not drop below acceptable County standards. Therefore, this is a less-than-significant impact.

b) Traffic hazards related to: 1) safety from design features (e.g. sharp curves or dangerous intersections); 2) barriers to pedestrians or bicyclists; or 3) incompatible uses (e.g. farm equipment)? (source # (s) Countywide Plan (1994)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Each bridge crossing roadway may be closed off during work with standard County Public Works signage. Ingress and egress to the neighborhood during sediment removal activities is available on adjacent streets within the Town of Stinson Beach. Alternative routes will be marked clearly with County of Marin traffic control signs. Neighbors will have access to their properties during the maintenance period. Therefore, this is a less-than-significant impact.

c) Inadequate emergency access or access to nearby uses? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Ingress and egress to the neighborhood during sediment removal activities is available on adjacent streets within the Town of Stinson Beach. Alternative routes will be marked clearly with County of Marin traffic control signs. Emergency vehicles will have continual access to local residences during the maintenance period. Therefore, this is a less-than-significant impact.

d) Insufficient parking capacity on-site or off-site? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

Due to the temporary maintenance nature of the project, no additional parking will be required; therefore, this is a less-than-significant impact.

e) **Substantial impacts upon existing transportation systems, including rail, waterborne or air traffic systems? (source #(s):** *Countywide Plan (1994)*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Due to the temporary maintenance nature of the project, no substantial impacts upon existing transportation systems will occur on or around the site. Minor road closures may be required during the project, with the community being properly notified and no access to property denied during the sediment removal process. Therefore, this is a less-than-significant impact.

7. BIOLOGICAL RESOURCES. *Would the proposal result in:*

a) **Reduction in the number of endangered, threatened or rare species, or substantial alteration of their habitats including, but not necessarily limited to: 1) plants; 2) fish; 3) insects; 4) animals; and 5) birds listed as special-status species by State or Federal Resource Agencies? (source #(s):** *#2,3,4,5*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The channel in its existing condition is highly aggraded, filled in with material from the landslide on GGNRA lands in the upper watershed. The existing aggradation is likely having a number of negative effects, including compromising habitat by filling of pools, impacting marcro-invertebrate populations and decreasing available shelter for fish and other aquatic inhabitants. The build-up of sediment below each bridge crossing increases the likelihood that wood and other debris would get caught on the bridges during high flows and thus be removed from the system by emergency crews. The removal of woody debris has a negative impact on the stream ecosystem by reducing stream complexity and shelter, as well as eliminating pool forming elements.

According to the County of Marin's biological database, derived from the Department of Fish and Game's California Natural Diversity Database (CNDDB) and additional data derived from an Environmental Assessment prepared by the Golden Gate National Recreation Area for restoration of Easkoot Creek, the only threatened or endangered species known to exist in the immediate project area include steelhead trout (Oncorhynchus mykiss) and coho salmon (Oncorhynchus kisutch). Per conversation with local Fish and Game biologist Jeremy Sarrow (8/22/07) and use of the National Marine Fisheries Service on-line database for fishery distribution in Marin County, coho salmon are not recognized as present in Easkoot Creek, although a very small number of fish may have occasionally strayed into the creek from the Bolinas Lagoon. No Northern Spotted Owl (Strix occidentalis caurina) are known to occur within the project area. No endangered plant species are known to exist on or around the immediate site either. In addition, no California red- legged frogs (Rana aurora draytonii), California fresh water shrimp (Syncaris pacifica) or Northwestern pond turtles (Clamnys marmorata marmorata) are known to exist on or near the immediate site. No occurrences for these species were noted during the CNDDB review.

In order to avoid any potential impact on salmonids that may be present in the creek, the following condition will be met. Therefore, this is a less-than-significant impact.

- All work will take place during October, at time of lowest water, but no later than October 31st in order to minimize exposure to potential rain storms.
- Work will begin at the most downstream crossing, moving upstream, to minimize the effects of turbidity on upstream reaches.

- Should any salmonids be present on site, a State and/or NMFS certified fisheries biologist will be on-site to block net the creek and move the fish upstream into clean water, upstream of the Arenal Ave. crossing.
- All sediment removal will be confined to the stream channel itself and all work will be conducted from the bridges and top of bank, avoiding encroachment into the riparian corridor.
- All native riparian vegetation will be protected from heavy equipment and dredging activities.
- All sediment removed from the site will be hauled away to an upland spoils storage site.
- A fisheries biologist will be on-site the entire time during working hours to ensure that the work is being done according to conditions set forth in the California Fish and Game 1600 Streambed Alteration Agreement conditions.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Substantial change in the diversity, number, or habitat of any species of plants or animals currently present or likely to occur at any time throughout the year? (source #(s): *3, 4*	[ ]	[ ]	[X]	[ ]

The conditions outlined above in Section 7 (a) will be met during project implementation, as per recommendation from the West Marin Department of Fish and Game biologist who is issuing the 1600 permit for the project. A County creek biologist will be on-site during the entire project to ensure that these conditions are met. Therefore, no substantial change in animal or plant species, numbers or diversity is expected to result from the project; therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Introduction of new species of plants or animals into an area, or improvements or alterations that would result in a barrier to the migration, dispersal or movement of animals? (source #(s):	[ ]	[ ]	[X]	[ ]

The proposed sediment removal activities are intended to restore the site to a more natural channel condition and will not contribute to the introduction of plants or animals into the creek channel or adjacent streambanks. Removal of excessive sediment should help to open the channel and enhance migratory opportunities for fish and other aquatic organisms. Therefore, this is a less-than-significant impact.

8. ENERGY AND NATURAL RESOURCES. *Would the proposal result in:*

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Substantial increase in demand for existing energy sources, or conflict with adopted policies or standards for energy use? (source #(s): *Countywide Plan (1994)*	[ ]	[ ]	[ ]	[X]

Due to the maintenance nature of the project, no increase in demand for existing energy sources or standards for energy use will be affected. Therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Use of non-renewable resources in a wasteful and inefficient manner? (source #(s): *Countywide Plan (1994).*	[ ]	[ ]	[ ]	[X]

No use of non-renewable resources is necessary for this project; therefore, this is a less-than-significant impact.

c) Loss of significant mineral resource sites designated in the Countywide Plan from premature development or other land uses which are incompatible with mineral extraction? (source #(s): *Countywide Plan (1994);*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

No significant mineral resources are found on the project site, therefore, this is a less-than-significant impact.

9. HAZARDS. ***Would the proposal involve:***

a) A risk of accidental explosion or release of hazardous substances including, but not necessarily limited to: 1) oil, pesticides; 2) chemicals; or 3) radiation)? (source #(s): *Countywide Plan (1994).*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

No hazardous substances are known to exist on the project site nor will any be used during the sediment removal activities, therefore, this is a less-than-significant impact.

b) Possible interference with an emergency response plan or emergency evacuation plan? (source #(s): .	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The sediment removal activities will not interfere with an emergency response or evacuation plan. Bridge crossings will be closed temporarily during the day. In case of emergency all heavy equipment will be removed from the roadway immediately in order to allow vehicles to enter or leave the adjacent neighborhood. Heavy equipment deployed on the bridges can be removed in a matter of a few minutes during an emergency or evacuation. Therefore, this is a less-than-significant impact.

c) The creation of any health hazard or potential health hazard? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

The removal of sediment from the creek will not create any health hazards; therefore, this is a less-than-significant impact.

d) Exposure of people to existing sources of potential health hazards? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

The removal of sediment from the creek will not expose people to existing sources of health hazards; therefore, this is a less-than-significant impact.

e) Increased fire hazard in areas with flammable brush, grass, or trees? (source #(s):	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

The project will have no effect on the fire hazard to the surrounding area; therefore, this is a less-than-significant impact.

10. NOISE. ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Substantial increases in existing ambient noise levels? (source #(s):	[ ]	[ ]	[X]	[ ]

There will be a temporary increase in ambient noise levels during normal working hour, from the heavy equipment used to remove sediment from the creek. The duration of the impact will be for a few days and the location of the increased noise will move from crossing to crossing as the work progresses. The noise impact is limited to the creek channel are, therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Exposure of people to significant noise levels, or conflicts with adopted noise policies or standards? (source #(s): *Countywide Plan (1994)*	[ ]	[ ]	[X]	[ ]

There will be an increase of noise levels during the one week of maintenance activities, but only for a temporary time as with any maintenance project. The increase in maintenance related noise levels would only occur during the County's adopted noise policy from 7am-6pm, Mon.-Fri. and not on holidays. Therefore, this is a less-than-significant impact.

11. PUBLIC SERVICES. ***Would the proposal have an effect upon, or result in a need for new or altered government service in any of the following areas:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Fire protection? (source #(s):	[ ]	[ ]	[ ]	[X]

The sediment removal project will not have an effect on fire protection; therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Police protection? (source #(s	[ ]	[ ]	[ ]	[X]

The sediment removal project will not have an effect on police protection; therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Schools? (source #(s):	[ ]	[ ]	[ ]	[X]

The sediment removal project will not have an effect on the local school; therefore, this is a less-than-significant impact.

d) **Maintenance of public facilities, including roads? (source #(s):**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The proposed project will positively affect the maintenance of County road crossings since it will increase the free board below each of the bridges and will decrease the risk of debris catching on the bridges, which can cause harm to the structures during high stream flows. The project should also decrease the potential frequency of flooding and consequential impacts on County roads; therefore, this is a less-than-significant impact.

e) **Other governmental services? (source #(s):**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The County of Marin Flood Control District Zone 5 was established in Stinson Beach to assist the town in implementing flood control measures to protect residential and public facilities during high storm events. The County Flood Control District has historically achieved this objective by periodically removing sediment from Easkoot Creek when it has aggraded to the point of compromising flood carrying capacity. Enactment of the project will allow the Flood Control District the ability to provide these critical services for the Town of Stinson Beach residents. Therefore, this is a less-than-significant impact.

12. UTILITIES AND SERVICE SYSTEMS. ***Would the proposal result in a need for new systems, or substantial alterations to the following utilities:***

a) **Power or natural gas? (source # (s):** *Countywide Plan (1994)*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

No alterations to power or natural gas will be required for the project; therefore, this is a less-than-significant impact.

b) **Communications systems? (source # (s):** *Countywide Plan (1994)*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

No alterations to communications systems will be required by the project, therefore, this is a less-than-significant impact.

c) **Local or regional water treatment or distribution facilities? (source #(s):** *Countywide Plan (1994)*	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[ ]	[X]

No alterations to water treatment or distribution will be required by the project; therefore this is a less-than-significant impact.

d) Sewer or septic tanks? (source #(s): *Countywide Plan (1994*	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[ ]	[X]

No alterations to sewer or septic tanks will be required by the project, therefore, this is a less-than-significant impact.

e) Storm water drainage? (source #(s)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The storm water drainage system that carries water into Easkoot Creek from properties and roads within the Town of Stinson Beach, will not be negatively affected by the project. The project should have a positive affect on the ability of stormwater run-off to remain in the creek, since the project's objective is to increase channel carrying capacity, especially during peak storm events, therefore, this is a less-than-significant impact. See Section V. 4 Water.

f) Solid waste disposal? (source #(s): *Countywide Plan; CF II.2*	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[ ]	[X]

No alterations to solid waste disposal will be required by the project, therefore, this is a less-than-significant impact.

13. AESTHETICS/VISUAL RESOURCES. *Would the proposal:*

a) Substantially reduce, obstruct, or degrade a scenic vista open to the public or scenic highway, or conflict with adopted aesthetic or visual policies or standards? (source #(s): *Countywide Plan (1994)*	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[ ]	[X]

No alterations to scenic vistas will result from the project; therefore, this is a less-than-significant impact.

b) Have a demonstrable negative aesthetic effect by causing a substantial alteration of the existing visual resources including, but not necessarily limited to: 1) an abrupt transition in land use; 2) disharmony with adjacent uses because of height, bulk or massing of structures; or 3) cast of a substantial amount of light, glare, or shadow? (source #(s): *Countywide Plan (1994)*	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[ ]	[X]

No alterations to visual resources will result from the project; therefore, this is a less-than-significant impact.

14. CULTURAL RESOURCES. ***Would the proposal:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Disturb paleontological, archaeological, or historical sites, objects, or structures? (source #(s): *Countywide Plan (1994)*	[ ]	[ ]	[X]	[ ]

No known cultural resources of these types are known to exist in the immediate project site, which has been periodically dredged numerous times over the years. Review of cultural resource maps maintained by the Marin Community Development Agency indicates that the subject properties are located in an area of low archaeological sensitivity. Field surveys of the subject properties did not reveal any evidence of historic domestic materials; therefore no further archaeological survey or monitoring is warranted for the proposed project. Since no human remains or archaeological resources are know on project site or immediate vicinity, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Have the potential to cause a physical change which would adversely affect unique ethnic cultural values, or religious or sacred uses within the project area? (source #(s): *Countywide Plan(1994)*	[ ]	[ ]	[X]	[ ]

No known ethnic, religious or sacred uses are known to exist on or near the project site.

15. SOCIAL AND ECONOMIC EFFECTS. ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
Any physical changes which can be traced through a chain of cause and effect to social or economic impacts. (source #(s):	[ ]	[ ]	[ ]	[X]

The restoration project will not result in any known physical changes to social or economic entities.

VI. MANDATORY FINDINGS OF SIGNIFICANCE. Pursuant to Section 15065 of the State EIR Guidelines, a project shall be found to have a significant effect on the environment if any of the following are true: *(Please explain your answer after each question*

		Yes	No	Maybe
a)	Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
b)	Does the project have the potential to achieve short-term, to the disadvantage of long-term, environmental goals? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
c)	Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects). *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
d)	Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]

VII. PROJECT SPONSER'S INCORPORATION OF MITIGATION MEASURES:

Acting on behalf of the project sponsor or the authorized agent of the project sponsor, I (undersigned) have reviewed the Initial Study for the Easkoot Creek Sediment Removal, Stinson Beach, CA and have particularly reviewed the mitigation measures and monitoring programs identified herein. I accept the findings of the Initial Study, including the recommended mitigation measures, and hereby agree to modify the proposed project application4s now on file with Marin County to include and incorporate all mitigation measures and monitoring programs set out in this Initial Study.

_____ _____

(Project Sponsor's Name or Representative) Date

_____ _____

(Project Sponsor's Name or Representative) Date

VII. DETERMINATION: Pursuant to Sections 15081 and 15070 of the State Guidelines, the foregoing Initial Study evaluation, and the entire administrative record for the project:

[X] I find that the proposed project WILL NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.

[ ] I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because the mitigation measures described on an attached sheet have been added to the project. A NEGATIVE DECLARATION will be prepared.

[ ] I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.

Signature _____ Date _____

Printed Name _____ Date _____

ATTACHMENT A

INITIAL STUDY
ENVIRONMENTAL CHECKLIST FORM

DOCUMENTS INCORPORATED BY REFERENCE

6) Marin Countywide Plan, CDA- Planning Division (1994)

7) Easkoot Creek Restoration at Stinson Beach- Environmental Assessment U.S. Dept of the Interior National Park Service; Golden Gate National Recreation Area.

8) California Department of Fish and Game Streambed Alteration Agreement for Sediment Removal in Easkoot Creek (October 2006)

9) Conversation with Jeremy Sarrow, Department of Fish and Game biologist. August 22, 2007

10) National Marine Fisheries Service Protected Resources- Marin County database.

Flood Control Zone 5
Creek Sediment Removal Sites

N

Marin County Flood Control and Water Conservation District
County of Marin
Date: May 2007

433897

NOTICE OF DETERMINATION

Marin County Environmental Coordination and Review

FILED
MAR 05 2013
RICHARD N. BENSON
MARIN COUNTY CLERK
BY: J. Whitney, Deputy

TO: ☒ Office of Planning and Research
☒ County Clerk, County of Marin

FROM: Marin County Flood Control and Water Conservation District

SUBJECT: Filing of Notice of Determination in compliance with Section 21108 or 21152 of the Public Resources Code.

Project Title: EASKOOT CREEK SEDIMENT REMOVAL

State Clearinghouse #: #2007-092065
(if submitted to State Clearinghouse)

Contact Person: **Kallie Kull** **Telephone Number: (415) 473-6532**
Assessor's Parcel: **N/A** **Application: Sediment Removal**
Project Location: **Marin County**

Project Description:
In this addendum, the original 2007 Project description has been modified to include the following activities:

1) Construction of an additional sediment removal site (#2) within the floodprone plain of the Easkoot Creek and annual sediment removal from this site. Site #2 is located on National Park property directly adjacent to the Stinson Beach parking lot and behind the Parkside Café;

2) Annual sediment removal at all established sediment removal sites on an as needed basis;

3) Dewatering of the Easkoot Creek channel when necessary for sediment removal including fish relocation as needed, to avoid impacts to native salmonid populations;

4) Low-impact vegetation maintenance for flood control purposes in sections of the Easkoot mainstem that are maintained as flood control easements or where the Flood Control District has a landowner access agreement in place with private property owners.

This is to advise that the Department of Public Works approved the above described project on May 17, 2012, and has made the following determinations regarding the above described project:

1. The approval is within the scope of a project which was previously approved (October 19, 2007),
2. The Initial Study approved on October 22, 2007 for the previous project approval adequately describes the current approval for the purposes of CEQA,

N-13-05

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POSTED 3/5/13 TO 4/4/13

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3. Pursuant to Section 15164(e) of the CEQA Guidelines, there is no need to prepare a subsequent or supplemental Initial Study/Negative Declaration , and
4. Findings were made pursuant to the provisions of CEQA.

I certify that a copy of the 2007 Negative Declaraion for the Easkoot Creek Sediment Removal, and record of current project approval is on file and may be examined at:

Agency: Marin County Department of Public Works
Address: 3501 Civic Center Drive, #304
San Rafael, CA 94903

_____ Date: 2-28-13
Robert Beaumont; Marin County Flood Control
and Water Conservation District

_____ Date: 3/4/13
Rachel Warner, Environmental Planning Manager

The filing of this Notice of Determination starts a 30 day statute of limitations on court challenges to the approval under CEQA.

MARIN COUNTY COMMUNITY DEVELOPMENT AGENCY
PLANNING DIVISION

ADDENDUM TO NEGATIVE DECLARATION OF ENVIRONMENTAL IMPACT
EASKOOT CREEK SEDIMENT REMOVAL

I. BACKGROUND

A. Project Sponsor's Name and Address: Marin County Flood Control and Water Conservation
3501 Civic Center Dr., Room 304
San Rafael, CA 94903

B. Lead Agency Name and Address: Marin County Flood Control and Water Conservation District
3501 Civic Center Dr., Room 304
San Rafael, CA 94903

C. Contact Person and Phone Number: Kallie Kull, Senior Planner, (415) 473-6532

II. PROJECT DESCRIPTION

A. Project Title: Easkoot Creek Sediment Removal

B. Type of Application(s): Flood Control Routine Maintenance

C. Project Location: Easkoot Creek mainstem channel and bridge crossings over Easkoot Creek on Arenal Ave., Calle del Pinos. Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo, within the Town of Stinson Beach.

D. General Plan Designation: The Project site is located within the mapped Coastal Recreation Corridor of the Marin Countywide Plan (CWP) and has a land use designation of C-SF3 (Coastal, Single Family, one unit per one acre to five acres). The CWP Environmental Quality Element designates the Stinson Beach area as an important Environmental Corridor and Resource Conservation Area.

E. Zoning: C-MF2 1-4 units per acre

F. Description of Project:

Previous Entitlement

A previously adopted Negative Declaration was prepared for the Easkoot Creek Sediment Removal Project, which was approved on October 22, 2007. The Project entailed the Marin County Flood Control District's (*District*) removal of sediment from the Easkoot Creek channel immediately upstream and downstream of six bridge crossings in the Stinson Beach Community at the following locations: 1) Arenal Ave.,2) Calle del Pinos. 3) Calle del Pradero, 4) Calle del Sierra, 5) Calle del Onda, and 6) Calle del Arroyo. The purpose of the 2007 Project was to increase channel capacity and reduce the risk of flooding in the Stinson Beach neighborhood adjacent to the Easkoot Creek channel. The approved project area was limited to no greater than 400 square feet at each crossing, extending no more than 20 feet up or downstream from each of the bridge crossings and the amount of material removed was limited to no more than 20 cubic yards of material to be removed per crossing. The District proposed to conduct sediment removal activities for one year and then monitor the results and confer with the California Department of Fish and Game (DFG) on overall project design and implementation. In 2007 the Project was implemented and monitored and since then alternatives have been studied to

improve the effectiveness of flood control activities while minimizing impacts to Easkoot Creek. The two feasible alternatives considered by the District included:

Alternative 1; High flow by-pass channel. The District initiated discussions with the National Park Service (NPS) regarding the possibility of constructing of a high-flow bypass channel across the Stinson Beach public parking lot that would direct a portion of the creek's winter flow into this channel and directly into the ocean during high storm events. The NPS expressed concern regarding the infrastructure and maintenance, and the Department of Fish and Game expressed concerns about impacts to juvenile steelhead that typically spend time in Bolinas Lagoon before maturing and leaving the estuary system for the ocean. Fishery consulting engineers Mike Love and Associates were hired to analyze the impacts of this alternative on the federally and state listed steelhead population of Easkoot Creek. The results of that study are documented in a technical memo to the District which concludes that there would be potential for negative impacts to steelhead under this alternative. A copy of the technical memo is available upon request from the Marin County Flood Control and Water Conservation District.

Alternative 2: Stinson Beach Flood Control Routine Maintenance Activities Program (*preferred alternative*). The preferred alternative which is acceptable to the National Park Service and recommended by the Department of Fish and Game takes a broader approach to the issue of flood control in the Stinson Beach community by creating the Stinson Beach Routine Maintenance Activities (SB RMA) program for flood control (see revised Project Description below). The objective of the Project is to optimize the effectiveness of the District's sediment removal and combine it with vegetation maintenance in Easkoot Creek to reduce the potential risk of flooding in the Stinson Beach Community, while minimizing impacts to the creek and the listed population of steelhead trout.

Proposed Modifications to the Original 2007 Project

In this addendum, the original 2007 Project description has been modified to include the following activities:

1) Construction of an additional sediment removal site (#2) within the floodprone plain of the Easkoot Creek and annual sediment removal from this site. Site #2 is located on National Park property directly adjacent to the Stinson Beach parking lot and behind the Parkside Café;

2) Annual sediment removal on all established sediment removal sites on an as needed basis;

3) Dewatering of the Easkoot Creek channel when necessary for sediment removal including fish relocation as needed, to avoid impacts to native salmonid populations;

4) Low-impact vegetation maintenance for flood control purposes in sections of the Easkoot mainstem that are maintained as flood control easements or where the Flood Control District has a landowner access agreement in place with private property owners.

1) Construction of sediment removal site #2 and annual sediment removal from all sites as needed

The revised Project description includes establishment of an additional sediment removal site within a low gradient reach of Easkoot Creek adjacent to the Stinson Beach public parking lot, where annual sediment can be removed with least impact to surrounding habitat. The site typically goes dry in the summer and is easily accessed by equipment, so impacts to habitat will be minimized. The proposal will construct a more geomorphically stable creek channel through the site at bankfull width with some floodprone width (floodplain) constructed at the mean bankfull height above the thalweg. Building the sediment removal site using bankfull channel dimensions should aid in the geomorphic stability of the proposed design.

The primary objective of constructing sediment removal site #2 is to enable the District to remove a greater amount of sediment from the floodplain of the Easkoot Creek channel at a location that is easy to access and where sediment will

naturally accumulate due to channel morphology. Sediment removal site #2 will be monitored by the District to assess the effectiveness of sediment removal on channel bed elevation and flood flow capacity and will serve as a pilot study to assess the cost-effectiveness of a centralized sediment removal area to improve downstream flood protection of homes and businesses. An objective of establishing this additional site is to potentially decrease the frequency of sediment removal needed at the bridge crossings in the downstream reach of creek. The District expects sediment removal site #2 to be in operation for a minimum of five years, depending on its effectiveness in capturing sediment and the cost-effectiveness of removing sediment from the creek in this location. Constructing sediment site #2 meets a goal of the DFG prior permit approval in 2007, to look for alternatives that reduce the need for sediment removal at the bridge crossings, however sediment will continue to be removed at the bridge crossings on an as-needed basis.

2) **Dewatering and fish relocation**

Prior to construction of sediment removal site #2 and prior to annual sediment removal activity in any of the permitted project areas, the Project manager in coordination with the District biologist will assess whether there is a need to dewater the channel and relocate fish. Typically the creek goes dry in several of the sites in the fall when the Project is to be implemented, however if there is water in the channel that supports fish habitat, the creek will be dewatered and fish will be relocated by a qualified biologist to a reach lower in the channel where there is sufficient habitat for survival (typically downstream of Arroyo Ave.). Dewatering and fish relocation Project design measures and Best Management Practices (BMPs) are included in the program and will be adhered to during Project implementation.

3) **Riparian Enhancement and Vegetation Maintenance**

Riparian enhancement and vegetation maintenance for flood control purposes is performed annually by the Conservation Corps North Bay (CCNB) under direction of the Marin County Flood Control District. Vegetation maintenance is performed only where the County holds a flood control easement or the work is within the County road right-of way. Additional work may be performed in sections of the creek that flow through private properties where the District has a landowner access agreement with the property owner. The goal of riparian enhancement is to establish a canopy cover that will suppress invasive plant growth, maintain cooler stream temperatures, and selectively limb and trim to reduce obstructions to flow in the channel. Occasionally crews may need to remove a downed or dead tree if it poses a hazard to adjacent structures or could pose a flood hazard if it falls into the channel, but in general the District will not remove live trees and will leave large wood in the channel as habitat or reposition wood so as to not have to remove it completely. Removal of trees is conducted in direct consultation with the Department of Fish and Game.

Routine vegetation pruning and removal below the high water mark and in the channel bed occurs from June 15th to October 15th of any given year. Cattail removal occurs from August 31st to October 15th, so that cattails do not reestablish before winter storms. Vegetation management activities are performed by crews using hand tools and do not include ground-disturbing activities. All vegetation maintenance is done without the use of herbicides.

G. Addendum to Negative Declaration:

An Addendum to the Negative Declaration of Environmental Impact (Oct 22, 2007) has been prepared for this Project. All currently proposed Project-related significant, adverse effects have been discussed in the 2007 Negative Declaration and all necessary mitigation measures have been incorporated into the conditions of approval. The Addendum has been prepared in compliance with CEQA Guidelines Section 15164(b) which states that an addendum to an adopted Negative Declaration may be prepared if only minor technical changes or additions are necessary, and there are no substantial changes to the Project or the circumstances under which the Project was undertaken, or significant new information of substantial importance.

The proposed Project would not involve, or result in, substantial changes in the Project or in substantial changes to the circumstances under which the Project was undertaken or significant new information of substantial importance. The proposed change in the Project does not trigger a need for additional environmental review because no new or substantially more severe impacts than those addressed in the previously-adopted 2007 Negative Declaration have been identified. Furthermore, the supplemental information presented does not require additional mitigation or substantial changes to the mitigation measures in the previously adopted 2007 Negative Declaration of Environmental Impact. Therefore, the Addendum to the previously adopted 2007 Negative Declaration is the appropriate method for reviewing the Project for CEQA compliance.

III. CIRCULATION AND REVIEW

A. Responsible Agencies: *(agencies whose approval is required and permits needed)*

- California Department of Fish and Game- 1600 Routine Maintenance Agreement
- US Army Corps of Engineers- 404 Permit
- Regional Water Quality Control Board SF Bay Watershed- 401 Water Quality Certification
- National Park Service; GGNRA- Special Use Permit
- County of Marin Community Development Agency- Coastal Development Permit

ADDITIONAL DOCUMENTS INCORPORATED BY REFERENCE

1. Marin Countywide Plan, Marin County Community Development Agency, Planning Division (2007).
2. Marin County Code; Supp. No. 6-11, Update 1; (June 7, 2011).
3. A Programmatic Approach to Routine Flood Control Maintenance Activities in Flood Control Zone 5 – Stinson Beach Marin County, California; Marin County Flood Control and Water Conservation District (2012).
4. A Programmatic Approach to Routine Flood Control Maintenance Activities in East Marin County; Marin County Flood Control and Water Conservation District (October 2011).
5. Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Flood Control and Water Conservation District. (July 2011).
6. Review of Background Information and Flood Control Alternatives for Easkoot Creek, Stinson Beach CA. Technical Memo; Mike Love and Associates; (July 2009).
7. Technical Memo from Roger Leventhal, P.E.; Design Basis for Proposed Easkoot Creek Geomorphic Channel and Floodplain Sediment Removal Area #2, Stinson Beach, Marin County, CA (Dec 2012).
8. O'Connor Environmental Inc., DRAFT Easkoot Creek Hydrology & Hydraulics Study Task 3b-Sediment Transport Evaluation.

IV. EVALUATION OF ENVIRONMENTAL IMPACTS AND MITIGATION MEASURES

Pursuant to Section 15063 of the State CEQA Guidelines, and the County EIR Guidelines, Marin County will prepare an Initial Study for all projects not categorically exempt from the requirements of CEQA. The Initial Study evaluation is a preliminary analysis of a project which provides the County with information to use as the basis for deciding whether to prepare an Environmental Impact Report (EIR) or Negative Declaration. The points enumerated below describe the primary procedural

steps undertaken by the County in completing an Initial Study checklist evaluation and, in particular, the manner in which significant environmental effects of the project are made and recorded.

A. The determination of significant environmental effect is to be based on substantial evidence contained in the administrative record and the County's environmental database consisting of factual information regarding environmental resources and environmental goals and policies relevant to Marin County. As a procedural device for reducing the size of the Initial Study document, relevant information sources cited and discussed in topical sections of the checklist evaluation are incorporated by reference into the checklist (e.g. general plans, zoning ordinances). Each of these information sources has been assigned a number which is shown in parenthesis following each topical question and which corresponds to a number on the data base source list provided herein as Attachment 1. See the sample question below. Other sources used or individuals contacted may also be cited in the discussion of topical issues where appropriate.

B. In general, a Negative Declaration shall be prepared for a project subject to CEQA when either the Initial Study demonstrates that there is no substantial evidence that the project may have one or more significant effects on the environment. A Negative Declaration shall also be prepared if the Initial Study identifies potentially significant effects, but revisions to the project made by or agreed to by the applicant prior to release of the Negative Declaration for public review would avoid or reduce such effects to a level of less than significance, and there is no substantial evidence before the Lead County Department that the project as revised will have a significant effect on the environment. A signature block is provided in Section VII of this Initial Study to verify that the project sponsor has agreed to incorporate mitigation measures into the project in conformance with this requirement.

C. All answers to the topical questions must take into account the whole of the action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts. Significant unavoidable cumulative impacts shall be identified in Section VI of this Initial Study (Mandatory Findings of Significance).

D. A brief explanation shall be given for all answers except "Not Applicable" answers that are adequately supported by the information sources the Lead County Department cites in the parenthesis following each question. A "Not Applicable" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g. the project falls outside a fault rupture zone). A "Not Applicable" answer shall be discussed where it is based on project-specific factors as well as general standards (e.g. the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).

E. "Less-than-significant Impact" is appropriate if an effect is found to be less-than-significant based on the project as proposed and without the incorporation of mitigation measures recommended in the Initial Study.

F. "Potentially Significant Unless Mitigated" applies where the incorporation of recommended mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less-than-significant Impact." The Lead County Department must describe the mitigation measures, and briefly explain how they reduce the effect to a less-than-significant level (mitigation measures from Section V, "Earlier Analyses", may be cross-referenced).

H. "Significant Impact" is appropriate if an effect is significant or potentially significant, or if the Lead County Department lacks information to make a finding that the effect is less-than-significant. If there are one or more effects which have been determined to be significant and unavoidable, an EIR shall be required for the project.

I. The answers in this checklist have also considered the current California Environmental Quality Act Guidelines and the Initial Study Checklist contained in those Guidelines.

V. ISSUES

1. LAND USE AND PLANNING. *Would the proposal:*

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Conflict with applicable Countywide Plan designation or zoning standards? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The determinations of policy consistency as discussed in this Initial Study section represent County staff interpretation of policies. However, this Initial Study does not determine policy consistency. The County decision-makers make the formal policy consistency determinations.

Section 15358(b) of the CEQA Guidelines states that "effects analyzed under CEQA must be related to a physical change in the environment", however policy inconsistencies may not necessarily indicate significant environmental effects Therefore, only those policy inconsistencies that would lead to a significant effect on the physical environment are considered significant impacts pursuant to CEQA. Where potentially significant environmental impacts are raised in the discussion below, they have been mitigated to a less-than-significant impact and, therefore, Project activities are determined to be consistent with the relevant policies cited. Mitigations are addressed further in the topical impact sections following the plan, policies and regulations analyses.

LOCAL PLANS, POLICIES, AND REGULATIONS

Land use designations and development of the Project sites are governed by the objectives and policies of the 2007 Marin Countywide Plan (CWP), sections of the Marin County Code, including Title 22 (Zoning) and Title 23 (Natural Resources) and Title 24 (Development Standards).

MARIN COUNTY CODE

TITLE 22- DEVELOPMENT CODE; Chapter 22.27- Native Tree Protection and Preservation

Section 22.27.040 (k) - Exemption to the Prohibition of Removal of a Protected Tree states that the Project proponent must demonstrate that the tree removal is by a public agency to provide for the routine management and maintenance of public land.

Consistent- The Project is consistent with the Marin County Code (Title 22) which requires projects to minimize tree removal and grading, as well as to maintain adequate site features that establish the visual character of the site. Marin County Flood Control District will minimize any riparian tree removal unless absolutely necessary to achieve the goals of the program, which are to protect the public and public facilities from flooding, while protecting water quality and sensitive habitats. To protect sites that are environmentally sensitive, the District will employ a suite of standard Project design measures and Best Management Practices to protect existing habitats and species of concern. Therefore, the Project is consistent with the development standards set forth in Title 22.

TITLE 23- NATURAL RESOURCES;

The provisions of Title 23 are enacted to protect and promote the public health, safety and general welfare, to preserve environmental qualities, and to protect the value, worth and enjoyment of the use of real property to the fullest extent possible, through the regulation of the uses or activities of the property in a manner which will prevent serious public injury.

Chapter 23.08 Excavating, Grading, and Filling
Chapter 23.08 establishes regulations for excavation, grading and filling in order to:

(1) Preserve and enhance the natural beauties of the land, streams, bays and shorelines;
(2) Reduce or eliminate the hazards of earth slides, mudflows, rock falls, undue settlement, erosion, siltation, sedimentation and flooding;
(3) Protect and enhance the water quality of watercourses, water bodies and wetlands and vegetation for wildlife habitat;
(4) Regulate de facto development caused by uncontrolled grading.

Activities of this nature which are considered exempt from the provisions of this chapter include: (a) Grading done by or on behalf of a public agency that assumes full responsibility for the work.

Consistent: The Project as described will be implemented by the County of Marin Flood Control District or private contractors under contract with the District. The District is a public agency and assumes full responsibility for the work conducted under this Project, therefore the Project is exempt from the terms of Chapter 23.08, and consistent with the requirements of this section of County code.

Chapter 23.09 Floodplain Management
It is the purpose of Chapter 23.09 to promote the public health, safety and general welfare and to minimize the losses described in this section by provisions designed to:

(A) Protect human life and health;
(B) Minimize expenditure of public money for flood control projects;
(C) Minimize the need for rescue and relief efforts associated with flooding and generally undertaken at the expense of the general public;
(D) Minimize prolonged business interruptions;
(E) Minimize damage to public facilities and utilities, such as water located in areas of special flood hazard;
(F) Help maintain a stable tax base by providing for the second use and development of areas of special flood hazard so as to minimize future flood blight areas;
(G) Ensure that potential buyers are notified that property is in an area of special flood hazard; and
(H) Ensure that those who occupy the areas of special flood hazard assume responsibility for their actions.

In order to accomplish its purposes, Chapter 23.09 includes methods and provisions for:

(A) Restricting uses which are dangerous to health, safety and property due to water or erosion hazards, or which result in damaging increases in erosion or in flood heights or velocities;
(B) Requiring that uses vulnerable to flood, including facilities which serve such uses, be protected against flood damage at the time of initial construction;
(C) Controlling the alteration of natural floodplains, stream channels, and natural protective barriers, which help accommodate or channel floodwaters;
(D) Controlling filling, grading, dredging and other development which may increase flood damage; and
(E) Preventing or regulating the construction of flood barriers which will unnaturally divert floodwaters or which may increase flood hazards in other areas.

Consistent- The Project is consistent with the Marin County Code Title 23 which was enacted to protect and promote the public health, safety and general welfare, and to preserve environmental qualities in a manner which would prevent serious public injury. The objective of the Project is to promote flood control and minimize risk to public health, safety and welfare. The program as designed will minimize potential impacts to sensitive habitats and will be designed to blend into the surrounding natural environment to the greatest extent feasible. The proposed flood control Project incorporates practices which enhance the biological and visual character of the creek corridor. Although some trimming of riparian

trees will occur to prevent flooding, the Project will not alter the riparian character of the Project sites and in many instances will improve the riparian corridor by removing non-native invasive plants. The implementation of the proposed program will respect the surrounding natural environment and return channel elevations to their previous condition prior to sedimentation. Therefore, the proposed Project is maintenance in nature, and will not change the Land Use Designations at the Project sites or conflict with zoning standards or the objectives of the above-mentioned code in any way; therefore, the Project will be consistent with applicable Marin County Code.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Conflict with applicable environmental plans or policies adopted by Marin County? (source #(s): 1, 3, 5)	[ ]	[X]	[ ]	[ ]

CONSISTENCY OF PROJECT WITH MARIN COUNTYWIDE PLAN (2007)

(1) Include Resource Preservation in Environmental Review

BIO-2.1 Include Resource Preservation in Environmental Review *to assess the impact of proposed development on native species and habitat diversity, particularly special-status species, sensitive natural communities, wetlands, and important wildlife nursery areas and movement corridors. Require adequate mitigation measures for ensuring the protection of any sensitive resources and achieving "no net loss" of sensitive habitat acreage, values, and functions.*
Consistent: The Marin County Flood Control District developed a biological assessment for the RMA program which evaluated potential impacts to native species, habitat diversity and special-status species and natural communities (Biological Assessment for Routine Flood Control Maintenance Activities; July 2011). The objective of the biological assessment was to identify adequate measures to protect any sensitive resources and achieve "no net loss" of sensitive habitat acreage, values, and functions. Prescriptions contained in the Biological Assessment include species related Project design measures as well as Special Conditions and Best Management Practices to be employed during Project implementation. The Project is guided by these prescriptions from the Biological Assessment so therefore, the Project will be consistent with Policy BIO-2.1.

(2) Coordinate with Trustee Agencies and Promote Early Consultation with Other Agencies

BIO-2.8 Coordinate with Trustee Agencies. *Consult with trustee agencies (the California Department of Fish and Game, U.S. Fish and Wildlife Service, National Oceanic and Atmospheric Administration (NOAA) Fisheries, U.S. Army Corps of Engineers, Environmental Protection Agency, Regional Water Quality Control Board, and Bay Conservation and Development Commission) during environmental review when special-status species, sensitive natural communities, or wetlands may be adversely affected.*

BIO-2.9 Promote Early Consultation with Other Agencies. *Require applicants to consult with all agencies with review authority for projects in areas supporting wetlands and special-status species at the outset of project planning.*

Consistent: The District has coordinated the development and review of this Project and its associated environmental documents with natural resource trustee agencies that require permits for the proposed work. Permitting agencies include the San Francisco Bay Regional Water Quality Control Board (SFBRWQCB), the California Department of Fish and Game, the US Army Corps of Engineers and the National Park Service.

(3) Protection of Riparian Systems

BIO-1.5 Promote Use of Native Plant Species. *Encourage use of a variety of native or compatible non-native, non-invasive plant species indigenous to the site vicinity as part of project landscaping to improve wildlife habitat values.*

BIO-1.7 Remove Invasive Exotic Plants. *Require the removal of invasive exotic species, to the extent feasible, when considering applicable measures in discretionary permit approvals for development projects unrelated to agriculture, and include monitoring to prevent re-establishment in managed areas.*

BIO-1.8 Restrict Use of Herbicides, Insecticides, and Similar Materials. *Encourage the use of integrated pest management and organic practices to manage pest with the least possible hazard to the environment. Restrict the use of insecticide, herbicides, or any toxic chemical substance in sensitive habitats, except when an emergency has been declared; the habitat itself is threatened; a substantial risk to public health and safety exists, including maintenance for flood control; or such use is authorized pursuant to a permit issues by the agricultural commissioner. Encourage non-toxic strategies for pest control, such as habitat management using physical and biological control, as an alternative to chemical treatment, and allow use of toxic substances only after approaches have been tried and determines unsuccessful. Continue to implement the Integrated Pest Management ordinance for county-related operations.*

BIO- 4.6 Control Exotic Vegetation. *Remove and replace invasive exotic plants with native plants as part of stream restoration projects and as a condition of site-specific development approval in than SCA and include monitoring to prevent reestablishment.*

BIO-4.7 Protect Riparian Vegetation. *Retain riparian vegetation for stabilization of stream banks and floodplains, moderating water temperatures, trapping and filtering sediments and other water pollutants, providing wildlife habitat, and aesthetic reasons.*

Consistent: Vegetation management activities are employed to achieve the goals of restoring creek habitat and maintaining channel function. Maintaining channel function is achieved by limbing and trimming, cattail cutting, removing vegetation from channel bottoms, and clearing trash. These activities occur from the channel bottom to the top of the high water mark, and include trimming tree limbs from trees and shrubs growing in the channel and trimming branches that hang down into the active channel. These activities employ vegetation control methods such as cutting and removing vegetation above the ground by hand or with loppers, hand saws, chainsaws, pole saws, weed eaters and other hand tools. Bladed weed-eaters are used to cut cattails. Herbicides and pesticides are never used. Tree removal is a rare event. Program BIO-4f of the Countywide Plan recognizes that tree growth may be cleared from the stream channel where removal is essential to protect against property damage or prevent safety hazards. Tree health and hazard potential will be determined by appropriate environmental staff (arborist or biologist). Snags shall be left in place to provide habitat for birds and small mammals if they do not otherwise pose a flood or safety hazard. Staff will consult with CDFG whenever possible if tree removal is necessary, and retention of large wood debris in the creeks will follow CDFG protocols.

(4) Protection of Stream Conservation Areas

BIO-4.1 Restrict Land Use in Stream Conservation Areas. *A Stream Conservation Area (SCA) is established to protect the active channel, water quality and flood control functions, and associated fish and wildlife habitat values along streams. Development shall be set back to protect the stream and provide an upland buffer, which is important to protect significant resources that may be present and provide a transitional protection zone. Best management practices shall be adhered to in all designated SCAs. Best management practices are also strongly encouraged in ephemeral streams not defined as SCAs. Allowable uses in SCAs in any corridor consist of the following, provided they conform to zoning and all relevant criteria and standards for SCAs, as follows:*

- Existing permitted or legal nonconforming structures or improvements, their repair, and their retrofit within the existing footprint;
- Projects to improve fish and wildlife habitat;
- Driveway, road and utility crossings, if no other location is feasible;
- Water monitoring installations;
- Passive recreation that does not significantly disturb native species;
- Necessary water supply and flood control projects that minimize impacts to stream function and to fish and wildlife habitat;
- Agricultural uses that do not result in any of the following:

a. The removal of woody riparian vegetation;
b. The installation of fencing within the SCA that prevents wildlife access to the riparian habitat within the SCA;
c. Animal confinement within the SCA; and
d. A substantial increase in sedimentation.

BIO-4.4 Promote Natural Stream Channel Function. *Retain and, where possible, restore the hydraulic capacity and natural functions of stream channels in SCAs. Discourage alteration of the bed or banks of the stream, including filling, grading, excavating, and installation of storm drains and culverts. When feasible replace impervious surfaces with pervious surfaces. Protect and enhance fish habitat, including through retention of large woody debris, except in cases where removal is essential to protect against property damage or prevent safety hazards. In no case shall alterations that create barriers to fish migration be allowed on streams mapped as historically supporting salmonids. Alteration of natural channels within SCAs for flood control shall be designed and constructed in a manner that retains and protects the riparian vegetation, allows for sufficient capacity and natural channel migration, and allows for reestablishment of woody trees and shrubs without compromising the flood flow capacity where avoidance of existing riparian vegetation is not possible.*

BIO- 4.5 Restore and Stabilize Stream Channels. *Pursue stream restoration and appropriate channel redesign where sufficient right-of-way exists that includes the following: a hydraulic design, a channel plan form, a composite channel cross-section that incorporates low flow and bankfull channels, removal and control of invasive exotic plant species, and bio-technical bank stabilization methods to promote quick reestablishment of riparian trees and other native vegetation.*

BIO-4.10 Promote Interagency Cooperation. *Work in close cooperation with flood control districts, water districts, and wildlife agencies in the design and choice of materials for construction and alterations within SCAs.*

Consistent: Easkoot Creek is subject to protection under the Stream Conservation Area protection policies as set forth in the Countywide Plan. The proposed Project is a flood control project that will maintain functioning channels for conveyance of stream flow, minimize impacts to fish and wildlife habitat, and reduce risk of flooding. Thus, it is a permitted activity within the SCA, as set forth in the Countywide Plan Policy BIO-4.1 Excavation of accumulated sediment and selective vegetation removal within the creek will work to restore the hydraulic and natural functions of the creek and reduce the risk of flooding, thus the Project is consistent with Polices BIO-4.4 and 4.5. The Project promotes interagency cooperation in that it will be implemented by the Marin County Flood Control District on National Park Service lands. Permits for the Project will be issued by the trustee agencies including the Department of Fish and Game, the US Army Corps of Engineers, the Regional Water Quality Control Board and the National Park Service.

5) Species and Habitat Preservation

BIO-1.1 Protect Wetlands, Habitat for Special-Status Species, Sensitive Natural Communities, and Important Wildlife Nursery Areas and Movement Corridors. *Protect sensitive biological resources, wetlands, migratory species of the Pacific Flyway, and wildlife movement corridors through careful environmental review of proposed development applications, including consideration of cumulative impacts, participation in comprehensive habitat management programs with other local and resource agencies, and continue acquisition and management of open space lands that provide for permanent protection of important natural habitats.*

BIO-1.3 Protect Woodlands, Forests, and Tree Resources. *Protect large native trees, trees with historical importance; oak woodlands; healthy and safe eucalyptus groves that support colonies of monarch butterflies, colonial nesting birds, or known raptor sites; and forest habitats. Prevent the untimely removal of trees through the implementation of standards in the Development Code and Native Tree Preservation and Protection Ordinance. Encourage other local agencies to adopt tree preservation ordinances to protect native trees and woodlands, regardless of whether they are located in urban or undeveloped areas*

BIO-2.5 Restrict Disturbance in Sensitive Habitat During Nesting Season. *Limit construction and other sources of potential disturbance in sensitive riparian corridors, wetlands, and baylands to protect bird nesting activities. Disturbance should generally be set back from sensitive habitat during the nesting season from March 1 through August 1*

to protect bird nesting, rearing, and fledging activities. Pre-construction surveys should be conducted by a qualified professional where development is proposed in sensitive habitat areas during the nesting season, and appropriate restrictions should be defined to protect nests in active use and ensure that any young have fledged before construction proceeds.

BIO-5.5 Protect Freshwater Habitats. *Preserve and where possible expand habitats associated with freshwater streams, seasonal wetlands, and small former marshes to facilitate the circulation, distribution, and flow of fresh water, and to enhance associated habitat values.*

Consistent: A Biological Assessment (BA) was completed for the RMA program in June 2011, which addresses the Project's potential impacts to water quality, wildlife and sensitive native habitats. Based on the findings in the BA, the RMA program specifies appropriate General and Activity-specific Conditions, and species-specific Project design measures to be employed at each Project site and for each type of maintenance activity. Program implementation also includes employment of existing Best Management Practices (BMPs) from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and the Federal Emergency Management Agency (FEMA).

An Environmental Compliance Coordinator (ECC) under the direction of the Flood Control District will work with the Project on a daily basis to ensure that all Project design measures and BMPs are implemented as prescribed in the field, depending on the location and nature of the activity. The ECC will be on-site to monitor the outcome of all conservation measures to assure protection of all fish and wildlife species and their habitats.

As prescribed in the Biological Assessment, pre-construction surveys for special-status animal and plant species will be completed at individual sites as necessary depending on work windows and seasonal conditions. If surveys confirm species occurrence at a project site, a biologist will oversee all construction work and implement appropriate conservation measures to protect these species. If necessary, avoidance of work areas and stop work orders will be employed if impacts to sensitive species and their habitat cannot be mitigated to a less-then-significant level or avoided completely. As discussed in detail in Sections V. 7. (a, b, c), the proposed Project, will adhere to the mitigation measures outlined in those sections, ensuring that the Project would have less-than-significant impacts on all special-status species, wildlife and habitat diversity. Therefore, the Project has been mitigated to consistency with Policies BIO-1.1, BIO-1.3, BIO-2.4, BIO-2.5, BIO-2.7.

(6) Protection of Watersheds and Water Quality

WR-1.1. Protect Watersheds and Aquifer Recharge. *Give high priority to the protection of watersheds, aquifer-recharge areas, and natural drainage systems in any consideration of land use.*

WR-2.3. Avoid Erosion and Sedimentation. *Minimize soil erosion and discharge of sediments into surface runoff, drainage systems, and water bodies. Continue to require grading plans that address avoidance of soil erosion and on-site sediment retention. Require developments to include on-site facilities for the retention of sediments, and, if necessary, require continued monitoring and maintenance of these facilities upon project completion.*

Consistent: Continued implementation of this Project will help to restore the normal drainage pattern within the Project area by removing accumulated sediment from the creek. There will be a temporary increase in turbidity in these drainages as channel substrate is disturbed from the sediment removal process. These impacts will be short-term and localized. The District will use Best Management Practices (BMPs) outlined in the Bay Area Stormwater Management Agencies Association (BASMAA) Manual and FishNet4C Guidelines for Protecting Aquatic Habitat and Salmon Fisheries for County Road Maintenance. These BMPs include minimizing loss of native vegetation, conducting the work from the road whenever possible, timing the work prior to the rainy season, minimizing sediment disturbance and suspension within the water, taking all excavated material to an upland disposal site, and sediment/erosion controls to keep excess soil from washing or blowing away during removal, transport and storage (including sediment traps, silt fences, coir logs and wattles containing weed-free rice straw, as necessary). Dewatering will be conducted in a manner to reduce turbidity downstream of the Project area. As discussed in detail in Section V. 4. (c), the proposed Project will adhere to the

mitigation measures outlined in those sections, ensuring that the Project would have less-than-significant impacts on water quality and watersheds. Therefore, the Project has been mitigated to consistency with Policies WR-1.1, 2.3 and 2.4.

(7) Avoidance of Environmental Hazards

EH-3.2. Retain Natural Conditions. *Ensure that flow capacity is maintained in stream channels and floodplains, and achieve flood control using biotechnical techniques instead of storm drains, culverts, riprap, and other forms of structural stabilization.*

Consistent: The Project will restore the channel function of the Easkoot Creek drainage by removing obstructing vegetation and accumulated sediment, which should reduce the potential for flooding of adjacent roadways and promote public safety of people and property from the risks associated with flooding.

(8) Protection of Air Quality

AIR-2.0. Protection from Emissions. *Minimize the potential impacts from land uses that may emit pollution and/or odors on residential and other land uses sensitive to such emissions in unincorporated Marin County.*

AIR-5.0 Adaptation to Climate Change- Adopt policies and programs that promote resilient human and natural systems in order to ease the impacts of climate change.

Consistent: The effects on air quality are from exhaust coming from heavy equipment during sediment removal. These impacts are short-term and temporal, occurring incrementally over 1-7 day work periods, therefore the Project would contribute minimally to air impacts; no significant negative impacts related to air quality are identified. The removal of sediment from this low lying coastal stream will contribute positively to the Community of Stinson Beach's ability to be more resilient as it deals with potential flooding related to rising sea level, more severe weather patterns and increased storm water run-off related to climate change.

(9) Protection of Visual Resources

DES-4.1. Preserve Visual Quality *Protect scenic quality and views of the natural environment – including ridgelines and upland greenbelts, hillsides, water, and trees – from adverse impacts related to development.*

Consistent: The visual resources of the Project sites would not be adversely impacted by maintenance activities because the overall Project is designed to respect the surrounding natural environment and return it to its previous condition (i.e., by removing aggraded sediment, dead and fallen trees and non-native vegetation). Some trimming of riparian trees will occur, but the Project would not result in visual impacts to public or scenic views and vistas from adjacent roadways, therefore, the Project will be consistent with Policy DES-4.1.

(10) Avoid Impacts to Historical Resources

HAR-1.3. Avoid Impacts to Historical Resources. Ensure that human activity avoids damaging cultural resources.

Consistent: As discussed in Sections V. 14. (a, b), the proposed Project will disturb only aggraded sediment that has been carried from the upper watershed down through the stream and channel system, and all sites have previously been dredged multiple times over the past decades in the same locations. Should any cultural resources be discovered during sediment removal activities, all work shall immediately be stopped and the services of a qualified archaeologist from Sonoma State University's Cultural Resources Department shall be engaged to assess the value of the resource and to develop appropriate mitigation measures. As discussed in detail in Sections V. 14. (a), the proposed Project will adhere to the mitigation measures outlined in that section, ensuring that the Project would have less-than-significant impacts on historical resources. Therefore, the Project has been mitigated to consistency with Policy HAR-1.3.

3. **GEOPHYSICAL.** *Would the proposal result in or expose people to potential impacts involving:*

b) Substantial erosion of soils due to wind or water forces and attendant siltation from excavation, grading, or fill? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Grading and excavation within the creek channel will occur in order to construct sediment removal Site #2 and on an annual basis when the access road is used for equipment. If erosion is not controlled there could be a negative impact to water quality from siltation. Implementation of the following Project design measures are incorporated into the Project description and will be implemented as part of the Project design, therefore this will be a less than significant impact.

1) Erosion control Project design measures shall be incorporated into the Project to minimize the discharge of sediments and other pollutants downstream and to prevent channel or streambank erosion or destabilization once the activity has been completed. Erosion control measures shall be monitored during and after storm events and modifications shall be made, if needed.

2) No phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start-up of any phase of the Project that may result in sediment run-off to the stream. All associated erosion control measures must be kept on-site and be in place prior to the onset of precipitation.

3) To prevent streambed erosion from the use of temporary cofferdams, pipes and pumps used to de-water the creek channel, diversion pipe outlets would be placed on hard surfaces or outfall protection in the form of rock or similar material would be installed. These temporary cofferdams shall be secured with plastic sheeting and anchored in place. All temporary fill for construction of cofferdams, pumps, pipes and sheet plastic shall be removed from the stream after Project completion and the creeks shall be restored to their natural condition.

4) No debris, soil, silt, sand, cement, concrete, or washings thereof, or other construction related materials or wastes, oil or petroleum products or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into waters of the State. When operations are completed, any excess material that may be washed into waters of the State shall be removed from the work area and transported to a legal upland spoils disposal site.

c) Substantial changes in topography from excavation, grading or fill, including but not necessarily limited to: 1) ground surface relief features; 2) geologic substructures or unstable soil conditions; and 3) unique geologic or physical features? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

A long-term objective of this maintenance Project is to restore natural channel formation and to decrease the potential risk and frequency of flooding. A localized change in stream channel morphology at sediment removal site #2 will occur through the establishment of the site and the removal of sediment from all the sites on an annual basis. Given that the channel is currently negatively impacted by aggraded sediment, excavation will be positive in nature. Consequently, the Project will result in less-than-significant impact.

4. **WATER.** *Would the proposal result in*:

a) Substantial changes in absorption rates, drainage patterns, or the rate and amount of surface runoff? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Drainage patterns and rate of surface run-off into Easkoot Creek from the upper watershed and adjacent neighborhood will remain unaltered. The removal of sediment and obstructing vegetation from the channel will increase the channel's ability to carry surface run-off during high flood flows and improve connectivity between downstream and upstream habitats. If the channel has greater functional ability after maintenance has been performed, the potential risk of flooding of adjacent roads and the Stinson Beach Community will be reduced. Consequently, the Project will result in less-than-significant impacts.

b) Exposure of people or property to water related hazards, including, but not necessarily limited to: 1) flooding; 2) debris deposition; or 3) similar hazards ? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

This is a flood control Project which will decrease potential for flood hazards caused by vegetation or sediment deposition and loss of channel capacity, therefore the Project will have an overall beneficial effect on preventing potential flood hazards and debris deposition and consequently the Project will result in less-than-significant impacts.

c) Discharge of pollutants into surface or ground waters or other alteration of surface or ground water quality (e.g. temperature, dissolved oxygen or turbidity)? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Sediment removal activities include prescribed Best Management Practices (BMPs) to be employed during and after Project implementation. Erosion control BMPs are designed to keep soil from leaving the work sites. Potential water quality impacts could have a negative effect upon water quality and aquatic life. The Project design measures described in Section V. 3 (c) will be implemented during the proposed Project and have been incorporated into the Project description to avoid or minimize environmental impacts; therefore this will be a less than significant impact.

d) Substantial change in the amount of surface water in any water body or ground water either through direct additions or withdrawals, or through intersection of an aquifer by cuts or excavations? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

1) If there is water in the creek when sediment removal activities are scheduled and the creek needs to be dewatered, there could be temporary impacts to water resources with the potential to adversely affect aquatic resources. The following Project design measures will be implemented during the proposed Project and have been incorporated into the Project description to avoid or minimize environmental impacts; therefore this will be a less than significant impact.

2) The District shall construct the Project in a manner that protects fish and other aquatic resources and avoids loss of their habitat. A biologist shall oversee Project work and implement any necessary conservation measures to protect these species, including pre-construction surveys and rescue and relocation to suitable upstream or downstream habitat.

3) Cofferdams used to divert water shall be constructed with clean river gravel or sand bags and sealed with sheet plastic. Intakes and outlets should be designed to minimize turbidity and the potential to wash contaminants into the stream. If a work site is to be temporarily dewatered by pumping, intakes should be completely screened with wire mesh not larger than 5 millimeters to prevent amphibians from entering the pump system. On salmonid streams, the intake pipe shall be fitted with fish screens meeting CDFG and NOAA Fisheries' criteria to prevent entrainment or impingement of small fish (National Marine Fisheries Service 1997). A filtration/settling system must be included to reduce downstream turbidity (i.e. filter fabric, turbidity curtain). The selection of an appropriate system is based on the rate of discharge. If feasible, water that is pumped into a pipe should discharge onto the top of bank into a densely vegetated area, which may require extra hose length. Once the Project work is complete, water should be slowly released back into the work area to prevent erosion and decrease turbidity. The channel and soil surface shall be restored to its original or design configuration after the work is complete. Any material added to the channel or basin to provide support for the work approved under this provision shall be removed unless required for erosion control or habitat enhancement and/or restoration. All cofferdams, pumps, pipes, sheet plastic, silt fences or other non-native materials shall be removed from the stream upon Project completion.

4) Sufficient water shall at all times be allowed to pass downstream to maintain aquatic life below the diversion dam.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
e) Substantial changes in the flow of surface or ground waters, including, but not necessarily limited to: 1) currents; 2) rate of flow; or 3) the course or direction of water movements? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

The natural direction and rate of flow of surface waters will remain unchanged. The natural direction of flow of the creek and channel will not change, but the rates of surface flow in some areas may increase with the decreased coefficient of friction resulting from the removal of sediment. As the channel function is increased, there may be a decrease in flood flows coming from the creek and channel onto adjacent roads and properties, which is the objective of the Project. Therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
f) Substantial reduction in the amount of water otherwise available for public water supplies? (source #(s): 3)	[ ]	[ ]	[ ]	[X]

The Project is maintenance in nature and will not reduce the amount of water supply available to the public; therefore, this is not applicable.

6. **TRANSPORTATION/CIRCULATION.** ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Insufficient parking capacity on-site or off-site? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Construction of sediment removal site #2 and annual sediment removal in this location is scheduled after Labor Day on any given year in order to not impact the National Park Service parking at Stinson Beach. No road closure or additional parking will be required; therefore, this is a less-than-significant impact.

7. **BIOLOGICAL RESOURCES.** ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Reduction in the number of endangered, threatened or rare species, or substantial alteration of their habitats including, but not necessarily limited to: 1) plants; 2) fish; 3) insects; 4) animals; and 5) birds listed as special-status species by State or Federal Resource Agencies? (source #(s): 3, 5, 9)	[ ]	[ ]	[X]	[ ]

In order to assess potential impacts to special status species and their habitats, a Biological Assessment was conducted which looked at potential impacts of routine flood control maintenance activities on special status species and their habitats throughout Marin County, including Easkoot Creek. The following Project design measures will be implemented during the proposed Project and have been incorporated into the Project description to avoid or minimize environmental impacts; therefore this will be a less than significant impact.

1) The District will designate an Environmental Compliance Coordinator (ECC) to oversee the implementation of the Stinson Beach Routine Maintenance Activities Program in the field. Before commencement of any of the maintenance activities, the ECC will review the permit documents for specific information on the type, location and extent of the activity and associated areas of disturbance and determine the Project design measures to implement prior to the maintenance activity. The ECC will distribute the permit documents to the Maintenance Supervisor five days before beginning the maintenance activity and will continue to work with the Project manager to ensure compliance with all permit conditions prior to, during and post-construction.

2) Pre-construction surveys: Prior to construction, County Flood Control biologists will conduct all wildlife and plant pre-construction surveys in a timely manner as specified in the pand included in permits from USFWS, CDFG, ACOE and NOAA.

3) Dewatering and Fish Relocation: Prior to starting work in any location, the Project manager and the ECC will assess whether there is a need to dewater the channel and relocate fish. If standing water is observed in the creek to the extent that it would support fish, then fish are assumed to be present and prior to Project start, the creek will be dewatered and fish exclusionary devices (coffer dam and/or fish exclusionary screening) will be installed both upstream and downstream of the Project to prevent fish re-entering the Project area before completion of work. Fish will be relocated by a qualified biologist to a place lower in the channel where there is sufficient water and habitat for survival (typically downstream of Arroyo Ave.). Water pumped out of the channel during dewatering activities shall be discharged downstream in a manner to not create turbidity in the channel (i.e. discharged onto a vegetated section of bank and allowed to filter back into the channel). Dewatering and fish relocation Project design measures as defined in Section 1- Box 11 below will be adhered to during Project implementation.

4) If flow is intermittent and does not support fish habitat, excavation may occur within the wetted portion of the channel after installing a sediment boom downstream to allow turbid waters to settle out before being released downstream after sediment removal.

5) Any work using equipment located within the stream channel shall be performed in isolation from the flowing stream.

6) If anadromous salmonids are present, a qualified fisheries biologist with appropriate equipment (buckets, aerators, etc.) and qualifications must be on-site to catch and relocate fish downstream as dewatering proceeds.

7) The work area boundaries, including access routes, shall be the clearly marked in the field before any work begins and shall be the minimum size required to complete the Project. Access routes and staging areas shall be chosen such that disturbance or removal of vegetation is minimized.

8) To minimize impacts to the natural channel, mechanized equipment (e.g. excavator, gradall or vactor) shall be placed on top of bank whenever possible. Prior to the use of mechanized equipment in natural channels, the Project manager shall inform the contractor or the Marin County Public Works roads crew supervisor of the site access routes and work staging locations for the equipment to ensure the least disturbance practicable.

9) In the area where vegetation will be removed for construction of Sediment Removal Site #2, erosion control measures, native seeding and native plants indigenous to the area will be installed.

10) If a maintenance activity may cause the introduction of sediments into the stream, no phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to starting any phase of the Project that may result in sediment run-off to the stream. All associated erosion control measures must be kept on-site and be in place prior to the onset of precipitation.

11) No debris, soil, silt, sand, oil or petroleum products or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into waters of the State. When operations are completed, any excess material shall be removed from the work area where such material may be washed into waters of the State.

12) Heavy equipment may be placed in the channel to initially construct the sediment removal site, however all annual sediment removal from the sediment trap or at the bridge crossings shall be conducted from the top of bank or access ramp and no heavy equipment will be placed directly in the creek to remove sediment.

13) Activities shall not result in any permanent barriers to upstream or downstream migration of anadromous fish.

14) Generally, vegetation management shall be designed and conducted to meet the objectives of design capacity, channel and basin stability and accessibility while maximizing the shade, erosion control, water quality, and habitat functions of the vegetation.

15) The preferred maintenance approach is to prune lower limbs up to the top of the channel banks, if possible. Multi-stemmed trees are pruned down to a single trunk and lower limbs are removed up to the top of the channel banks, if possible. The goal of this maintenance approach is to develop a native canopy over the channel.

16) Vegetation management does not include the use of dozers, loaders, excavators and other heavy tracked or rubber tired equipment, with the exception of mowing equipment used for fire fuel reduction.

17) Vegetation management includes pruning trees and shrubs to remove lower brushy growth and encourage higher canopy development to provide additional shading that would reduce invasive non-native groundcover growth and promote cooler stream temperatures.

18) Areas where non-native vegetation has been removed shall be re-vegetated with appropriate California native species and protected using appropriate erosion control methods, to the maximum extent practicable. An erosion control seed mix native to the watershed shall be used to control erosion where needed and local plant materials and seeds derived from that watershed shall be used whenever possible.

19) Mulch or tree chips may be used to cover bare soils and if straw is used as mulch it must be seed free straw.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Substantial change in the diversity, number, or habitat of any species of plants or animals currently present or likely to occur at any time throughout the year? (source #(s): *3, 4*	[ ]	[ ]	[X]	[ ]

V.7(b)-1- The following Project design measures will be implemented during the proposed Project and have been incorporated into the Project description to avoid or minimize environmental impacts; therefore this will be a less than significant impact.

Dewatering and Fish Relocation The creek is typically dry at a number of these sites at the end of the summer however if there is flow in the creek in the any of the areas where the sediment trap will be constructed or sediment is to be removed annually, and the flow is great enough to support fish habitat, the following Project design measures will be implemented to dewater the stream and relocate salmonids:

1) Any work using equipment located within the stream channel shall be performed in isolation from the flowing stream.

2) If standing water is observed in the creek to the extent that it would support fish, then fish are assumed to be present and prior to Project start, the creek will be dewatered and fish exclusionary devices (coffer dam and/or fish exclusionary screening) will be installed both upstream and downstream of the Project to prevent fish re-entering the Project area before completion of work. Dewatering activities will be closely monitored by the Environmental Compliance Coordinator and the Project manager to ensure that the channel outside of the Project area is not inadvertently dewatered through sub-surface flow. If incidental dewatering is observed, the Project will be temporarily halted while the dewatering system is adjusted to ensure that water remains in areas of the channel outside of the Project area that continue to support fish habitat.

3) If flow is intermittent and does not support fish habitat, excavation may occur within the wetted portion of the channel after installing a sediment boom downstream to allow turbid waters to settle out before being released downstream after sediment removal.

4) If anadromous salmonids are present, a qualified fisheries biologist with appropriate equipment (buckets, aerators, etc.) and qualifications must be on-site to capture and relocate fish downstream as dewatering proceeds.

5) Cofferdams used to divert water shall be constructed with clean river gravel or sand bags and sealed with sheet plastic.

6) Intakes and outlets shall be designed to minimize turbidity and the potential to wash contaminants into the stream.

7) If a work site is to be temporarily dewatered by pumping, intakes shall be completely screened with wire mesh not larger than 5 millimeters to prevent amphibians from entering the pump system. If steelhead or coho salmon are present, the intake pipe shall be fitted with fish screens meeting CDFG and NOAA Fisheries' criteria to prevent entrainment or impingement of small fish (National Marine Fisheries Service 1997).

20) A filtration/settling system must be included to reduce downstream turbidity (i.e. filter fabric, turbidity curtain). The selection of an appropriate system is based on the rate of discharge. If feasible, water that is pumped into a pipe shall discharge onto the top of bank into a densely vegetated area, which may require extra hose length.

21) Dewatering activities will be closely monitored by the EEC and the Project manager during all dewatering and sediment removal activities to ensure that the channel outside of the Project area is not inadvertently dewatered through sub-surface flow. If incidental dewatering upstream or downstream of the dewatered area is observed, and there is potential for fish stranding due to drop in water levels outside of the defined Project area, the pumping associated with dewatering will be immediately halted. No work will resume until the EEC and the Project manager have adjusted the dewatering system or Project scope to ensure that no incidental dewatering strands fish outside of the Project area. Adjustments to solve this problem could include discharging the pumped water back up stream to continue watering the upper reach of creek above the Project site, and/or decreasing the depth of sediment removal such that water is not drawn down into the dredging area at such a rate to dewater the channel outside of the Project area. If adjustments to the dewatering system and/or the scope of work cannot be made to safeguard that the channel will not be dewatered outside of the Project area, then the sediment excavation at that site must be halted.

22) Once the Project work is complete, water shall be slowly released back into the work area to prevent erosion and increased turbidity.

23) The channel and soil surface shall be restored to its original or design configuration after the work is complete. Any material added to the channel or basin to provide support for the work approved under provisions for dewatering shall be removed unless required for erosion control or habitat enhancement and/or restoration.

Salmonids

If salmonids are determined or presumed to be present in the Project site, then the following Project design measures shall be implemented:

1) The Project will take place during late summer at times of lowest water although no work will be conducted before June 15th later than Oct. 15th of any given year unless approved by a Fish and Game biologist. The work window for this Project is established to minimize any potential impact on steelhead that may be present in the Project area.

2) To minimize turbidity and stress to steelhead habitat, personnel will avoid walking through stream pools and thalwegs, and will instead walk across riffles or outside of the stream bed to access a Project site.

3) No equipment is to be operated from within the active stream channel unless the stream has been dewatered and fish have been relocated by a qualified and permitted biologist.

4) If anadromous salmonids are present, a fisheries biologist with appropriate equipment (buckets, aerators, etc.) must be on-site to catch and move fish downstream as dewatering proceeds.
5) Cofferdams used to divert water shall be constructed with clean river gravel or sand bags and sealed with sheet plastic.

6) Intakes and outlets shall be designed to minimize turbidity and the potential to wash contaminants into the stream.

7) If a work site is to be temporarily dewatered by pumping, intakes shall be completely screened with wire mesh not larger than 5 millimeters to prevent amphibians from entering the pump system. On salmonid streams, the intake pipe shall be fitted with fish screens meeting CDFG and NOAA Fisheries' criteria to prevent entrainment or impingement of small fish (National Marine Fisheries Service 1997).

8) A filtration/settling system must be included to reduce downstream turbidity (i.e. filter fabric, turbidity curtain). The selection of an appropriate system is based on the rate of discharge. If feasible, water that is pumped into a pipe shall discharge onto the top of bank into a densely vegetated area, which may require extra hose length.

9) Once the Project work is complete, water shall be slowly released back into the work area to prevent erosion and increased turbidity.

10) The channel and soil surface shall be restored to its original or design configuration after the work is complete. Any material added to the channel or basin to provide support for the work approved under this provision shall be removed unless required for erosion control or habitat enhancement and/or restoration.

11) For minor actions where the creek is intermittent and does not support salmonid habitat, and the disturbance to construct cofferdams to isolate the work site would be greater than that which would occur with dewatering, measures will be put in place immediately downstream of the work site to capture suspended sediment. This may include installation of silt catchment fence or boom across the drainage or placement of a straw wattle or filter berm of clean river gravel. Silt fences and other non-native materials will be removed from the stream following completion of the activity.

Red-Legged Frog

The nearest known breeding location for California red-legged frogs is near Wilkins Gulch, approximately three miles away. Although CRLF have not been observed at the work sites proposed in this Project, there is potential for CRLF to occur there. The following Project design measures will be employed during Project implementation:

1) Pre-construction aquatic surveys should be conducted by a qualified biologist prior to the onset of any disturbance related activities, following the protocol outlined in the Revised Guidelines on Site Assessments and Field Surveys for the California Red-legged Frog (USFWS 2005).

2) If California red-legged frogs, tadpoles, or eggs are found, the appropriate state and federal agencies will be contacted to determine what actions should be taken. No frogs will be handled moved without proper authority.

3) If a maintenance activity site is to be temporarily dewatered by pumping, intakes shall be completely screened with wire mesh no larger than five millimeters to prevent CRLF from entering the pump system.

4) A biological monitor should on site to oversee aspects of the Project that disturbs CRLF habitat, e.g. disturbance of aquatic vegetation.

5) Training sessions should be given to all workers to inform them of protective measures, instruct them in identification of red-legged frogs, their upland and aquatic habitat requirements, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

California clapper rail and California black rail

None of the sites support suitable habitat for California clapper rail or California black rail; however there are CNDDB records for California clapper rail at the mouth of Easkoot Creek at Bolinas Lagoon, 1.25 miles from the nearest site. If work occurs during the non-nesting season between September 1st and January 31st, then avoidance has been achieved and work can proceed. When working within 250 ft of salt or brackish marshland during the period February 1st through August 31st, presence for either rail species shall be assumed and the following Project design measures shall be implemented:

1) Work shall be scheduled to occur between 8:00 AM and 4:00 PM in order to avoid early morning and late afternoon/evening hours when rails are most active.

2) Work shall be scheduled to avoid periods of high tides, as the high water reduces the amount of refugial habitat for the rails. No work shall occur near salt marsh habitats within two hours before or after predicted extreme high tides of 6.5 ft above the National Geodetic Vertical Datum (NGVD), as measured at the Golden Gate Bridge, and adjusted to the timing of local extreme high tide events at the Project sites.

3) Activities shall proceed as quickly as possible to reduce disturbance from noise, dust, etc.

4) Removal or disturbance of emergent tidal marsh vegetation shall be avoided, and removal or disturbance of vegetation at the tidal marsh/upland interface shall be avoided to provide a buffer of refugial habitat within as wide a swath as possible (3 meter minimum) from the Mean Higher High Water (MHHW) line. If removal is necessary, the work shall be scheduled outside of the breeding season (February 1 – August 31st); all vegetation shall be removed by hand, and shall be salvaged and retained for replacement after work is completed.

Raptors and wading birds

The work sites do not support breeding habitat for raptors or wading birds, but these birds could forage or rest in or near the sites. Several of the sites are adjacent to suitable habitat for raptors and wading birds. Although none of these species are listed, they are protected by the Migratory Bird Act, and impacts to them shall be minimized.

1) If work occurs after the nesting season (August 1st – January 31st), then avoidance has been achieved and work can proceed.

2) During nesting season, (February 1st – July 31st), the Environmental Compliance Coordinator shall walk the area of proposed activity each day before maintenance activities begin to determine presence of nesting raptors and wading birds. If none are observed, avoidance can be assumed and work can proceed. If a nest is observed any removal of trees or shrubs or maintenance activities in the vicinity of active bird nests could result in nest abandonment, nest failure or premature fledging. If removal of trees or shrubs occurs, or maintenance begins between February 1st and July 31st (includes nesting season for passerine or non-passerine birds, and raptors), a nesting bird survey shall be performed within 14 days prior to the removal or disturbance of potential nesting trees or shrubs. All trees with active nests shall be flagged and a non-disturbance buffer zone of 50-90 feet shall be established around the nesting tree, or the site shall be avoided until it has been determined that the young have fledged.

Landbirds

The Project sites are along a riparian corridor that potentially supports passerine and non-passerine birds, some of which are seasonal and some of which are year-round residents. Any removal of trees or shrubs, or maintenance activities in the vicinity of active bird nests, could result in nest abandonment, nest failure, or premature fledging. Destruction or disturbance of active nests would violate the federal Migratory Bird Treaty Act (MBTA) and California Department of Fish and Game (CDFG) Code.

1) Avoidance will be achieved if maintenance activities are scheduled for August 1st to January 31st to avoid the nesting season (February 1st to July 31st).

2) If removal of trees or shrubs occurs, or maintenance begins between February 1st and July 31st (includes nesting season for passerine or non-passerine birds, and raptors), a nesting bird survey shall be performed within 14 days prior to the removal or disturbance of potential nesting trees or shrubs. All trees with active nests shall be flagged and a non-disturbance buffer zone shall be established around the nesting tree, or the site shall be avoided until it has been determined that the young have fledged. Buffer zones typically range between 50-90 ft for passerines and non-passerine land birds. Active nests shall be monitored to determine when the young have fledged and are feeding on their own.

3) In addition to surveying trees and shrubs for nesting birds, surveys shall be conducted for ground nesting birds by walking narrow transects through the grassland adjacent to the Project site within 14 days prior to the commencement of Project related activities. The Project manager shall also review all staging areas to ensure nesting and special status birds are not present. If an active nest is sited active nests shall be flagged and a non-disturbance buffer zone shall be established around the nesting area, or the site shall be avoided until it has been determined that the young have fledged. Buffer zones typically range between 50-90 ft. for passerines and non-passerine land birds. Active nests shall be monitored to determine when the young have fledged and are feeding on their own.

Mammals

There are no listed mammal species in the Project quad maps and the mammals on the species of concern list are all bat species. Some of the sediment removal and vegetation maintenance sites may contain suitable habitat for roosting bats. Likely roost sites are under bridges and in trees (in layers of bark, woodpecker holes, and hollow branches). Bat presence can be determined, in part, by visual detection of bat guano in the vicinity of roost areas. The droppings are black and small, about 4 – 8 mm long. Bat droppings crumble into powder when crushed, as they consist of insect remains (in contrast, mouse droppings are sticky when fresh and hard when old). During evening hours bats may be confirmed visually at dusk although species identification cannot be ascertained without the use of sonar recordings and specialized software.

1) Tree removal may impact roosting bats; therefore, if tree removal is necessary, a qualified biologist shall conduct a habitat assessment for potentially suitable bat habitat. If the survey reveals no suitable habitat, avoidance has been achieved.

2) If trees that are suitable for bat habitat are to be removed from March 1 through April 15 and/or August 31 through October 15, then avoidance has been achieved, and the trees shall be removed following the two-phased removal system. The two-phased removal system shall be conducted over two consecutive days. The first day, in the afternoon, limbs and branches are removed by a tree cutter using chainsaws only. Limbs with cavities, crevices or deep bark fissures would be avoided, and only branches or limbs without those features would be removed. On the second day, the entire tree is removed.

3) If the survey reveals suitable bat habitat, and tree removal is scheduled for outside the work window (from April 16 through August 31 and/or October 16 through February 28), then presence/absence surveys shall be conducted prior to any tree removal. If presence/absence surveys are negative then avoidance has been achieved, and trees may be removed following the two-phased tree removal system. The two-phased removal system shall be conducted over two consecutive days. The first day, in the afternoon, limbs and branches are removed by a tree cutter using chainsaws only. Limbs with cavities, crevices or deep bark fissures would be avoided, and only branches or limbs without those features would be removed. On the second day, the entire tree is removed.

4) If presence/absence surveys result in bat occupancy then the occupied trees shall only be removed from March 1 through April 15 and/or August 31 through October 15 following the two-phased tree removal system (see above).

5) Training sessions shall be given to all workers during bat nesting season to inform them of protective measures, instruct them in identification of bats and their habitat requirements, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

Monarch Butterfly

The monarch butterfly is not federally or state listed; however, its roosting habitat is often reviewed under CEQA. The Easkoot Creek Project areas are adjacent to known over wintering sites for Monarch butterfly. Proposed activities will not

directly affect the butterflies but could produce noise disturbances and harassment to them. The butterfly overwintering season runs from October through March and typically the proposed maintenance activities will occur before the butterflies migrate to the area. When working during the period April 1st through September 30th, the Project manager shall walk the area of proposed activity each day before maintenance activities begin to determine presence of Monarch butterflies. If none are observed, avoidance can be assumed and work can proceed. If Monarch butterflies are observed at the site, the butterflies must be allowed to leave the site on their own before work commences.

Special Status Plant Species

1) Within the Project area where special status plant species may potentially occur, a qualified biologist shall conduct a habitat assessment during blooming periods to determine the presence of suitable habitat. If no potentially suitable habitat is identified during the habitat assessment, then avoidance has been accomplished and no further actions are necessary.

2) If suitable habitat is determined to be present within the Project area, botanical surveys shall be conducted before activities commence to determine whether any special status plant species are present. Rare plant surveys, if necessary, shall be conducted following the Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities (CDFG 2009b) and Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed and Candidate Plants (U.S. Fish and Wildlife Service 2000).

3) Surveys shall be conducted in the field when species are both evident and identifiable, normally during flowering or fruiting. Multiple visits to a site may be necessary to capture the floristic diversity present at the site.

4) If listed species are observed or presumed present, then the District shall take such action as is necessary to protect the plants, using fencing, buffers, etc. If possible and practicable, the Project shall be redesigned to avoid listed plant species.

Riparian Enhancement and Vegetation Maintenance

Vegetation management includes pruning trees and shrubs to remove lower brushy growth and encourage higher canopy development to provide additional shading that would reduce invasive non-native groundcover growth and promote cooler stream temperatures. Vegetation management does not include the use of dozers, loaders, excavators and other heavy tracked or rubber tired equipment.

1) Generally, vegetation management shall be designed and conducted to meet the objectives of design capacity, channel stability and accessibility while maximizing the shade, erosion control, water quality, and habitat functions of the vegetation.

2) The preferred maintenance approach is to prune lower limbs up to the top of the channel banks, if possible. Multi-stemmed trees are pruned down to a single trunk and lower limbs are removed up to the top of the channel banks, if possible. The goal of this maintenance approach is to develop a native canopy over the channel and remove obstructions to flow that could increase the risk of flooding.

3) At Site #2 (sediment trap) an access ramp down into the creek for equipment will be established and used for annual sediment removal activities. The access ramp will be revegetated each year with native grasses once sediment removal is completed and the remaining areas of bank in the vicinity of the trap will be left undisturbed. The loss of vegetation in the access ramp area will be compensated for by plantings within the National Park equal or greater in size than the area impacted by the access ramp.

Invasive Species

1) The District shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed.

2) As a precaution against invasive quagga and zebra mussels, if rubber boots or waders are used in maintenance activities, crew will wash and dry them off-site prior to using them in another creek or tributary.

VI. **MANDATORY FINDINGS OF SIGNIFICANCE.** Pursuant to Section 15065 of the State EIR Guidelines, a Project shall be found to have a significant effect on the environment if any of the following are true: *(Please explain your answer after each question*

		Yes	No	Maybe
a)	Does the Project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory?	[ ]	[X]	[ ]

As described in Section V of this Initial Study, the Project design measures included in the proposed Project will avoid or mitigate any environmental impacts from the proposed Project to a level of insignificance.

		Yes	No	Maybe
b)	Does the project have the potential to achieve short-term, to the disadvantage of long-term, environmental goals?	[ ]	[X]	[ ]

As described in Section V of this Initial Study, the proposed Project will meet both short-term and long term goals of protecting the environment.

		Yes	No	Maybe
c)	Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects).	[ ]	[X]	[ ]

As described in Section V of this Initial Study, any potential environmental impacts from the proposed Project would be mitigated to a level of insignificance; therefore there will not be a cumulative impact on the environment.

		Yes	No	Maybe
d)	Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	[ ]	[X]	[ ]

As described in Section V of this Initial Study, any potential environmental impacts from the proposed Project would be mitigated to a level of insignificance; therefore the Project will not cause substantial adverse effects on human beings, either directly or indirectly.

342164

NOTICE OF DETERMINATION
Marin County Environmental Coordination and Review

FILED
OCT 22 2007
MICHAEL J. SMITH
MARIN COUNTY CLERK
By: J. Whitney, Deputy

TO: ☒ Office of Planning and Research
☒ County Clerk, County of Marin

FROM: Marin County Department of Public Works
(Lead Agency)

SUBJECT: Filing of Notice of Determination in compliance with Section 21108 or 21152 of the Public Resources Code.

Project Title: Easkoot Creek Sediment Removal at Bridget Crossings
State Clearinghouse # 2007-092065
Contact Person: Kallie Kull, Senior Planner
Assessor's Parcel: N/A **Application: Sediment Removal**

Project Location: The project area is on Easkoot Creek, which runs through the town of Stinson Beach and discharges into the Bolinas Lagoon downstream of Calle del Arroyo. Driving directions; From Highway 101, just north of the Golden Gate bridge in San Francisco, take the Highway 1 north exit towards Mill Valley/Stinson Beach. Stay straight on Highway 1, veering right as needed to the Town of Stinson Beach (approximately 12 miles). Proceed north on Highway One and at the north end of town to find the intersections of the Calles with Highway 1. Turn left on the individual Calles to the bridges and project sites that cross Easkoot Creek.

Project Description: Sediment will be removed from the creek channel immediately upstream and downstream of six bridge crossings of Easkoot Creek with Arenal Ave., Calle del Pinos. Calle del Pradero, Calle del Sierra, Calle del Onda, and Calle del Arroyo. The area to be dredged will be no more than 400 square feet at each crossing, extending no more than 20 feet up or downstream from the bridge crossings and the amount of material removed will be no more than 20 cubic yards per crossing. The project will take place during late summer, no later than Oct. 31, at times of lowest water, so as to minimize any potential impact on salmon and steelhead that may be present in the project area. Should any fish be present on site, a State and/or NMFS certified fisheries biologist will be on-site to block net the creek and relocate the fish upstream. A creek biologist from the County will also be on-site the entire time during the project to ensure that the work is being done according to conditions set forth in the California Fish and Game 1600 Streambed Alteration Agreement conditions. All work will be done from the bank and no equipment will be placed in the creek. All sediment removed from the creek will be transported to a legal upland spoils disposal site.

This is to advise that the Marin County Department of Public Works Director approved the above-described project on October 19, 2007, and has made the following determinations regarding the above described project:

1. The project in its approved form will not have a significant effect on the environment.
2. A Negative Declaration was prepared for this project pursuant to the provisions of CEQA.
3. Mitigation measures were not made a condition of the approval of the project.
4. Findings were made pursuant to the provisions of CEQA.

I certify that a copy of the Negative Declaration of Environmental Impact, and record of project approval is on file and may be examined at:
Agency: Marin County Department of Public Works

Address: 3501 Civic Center Drive, Room 304
San Rafael, CA 94903-4112

By: _____
Farhad Mansourian, Director, Department of Public Works

Date: 10/22/07

The filing of this Notice of Determination starts a 30 day statute of limitations on court challenges to the approval under CEQA.

VII. PROJECT SPONSER'S INCORPORATION OF MITIGATION MEASURES:

Acting on behalf of the project sponsor or the authorized agent of the project sponsor, I (undersigned) have reviewed the Initial Study for the Easkoot Creek Sediment Removal, Stinson Beach, CA and have particularly reviewed the mitigation measures and monitoring programs identified herein. I accept the findings of the Initial Study, including the recommended mitigation measures, and hereby agree to modify the proposed project application4s now on file with Marin County to include and incorporate all mitigation measures and monitoring programs set out in this Initial Study.

Farhad Mansourian — 10-22-07

(Project Sponsor's Name or Representative) — Date

(Project Sponsor's Name or Representative) — Date

VII. DETERMINATION: Pursuant to Sections 15081 and 15070 of the State Guidelines, the foregoing Initial Study evaluation, and the entire administrative record for the project:

[X] I find that the proposed project WILL NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.

[ ] I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because the mitigation measures described on an attached sheet have been added to the project. A NEGATIVE DECLARATION will be prepared.

[ ] I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.

Signature T Haddad Date 9/13/07

Printed Name Tim Haddad Date September 13, 2007

416402

NOTICE OF DETERMINATION

Marin County Environmental Coordination and Review

FILED
JUN 06 2012
RICHARD N. BENSON
MARIN COUNTY CLERK
BY: J. Whitney, Deputy

TO: ☒ Office of Planning and Research
☒ County Clerk, County of Marin

FROM: Marin County Flood Control and Water Conservation District
(Lead Agency)

SUBJECT: Filing of Notice of Determination in compliance with Section 21108 or 21152 of the Public Resources Code.

Project Title: Marin County Flood Control Routine Maintenance Activities Program

State Clearinghouse #: 2012022053 *(if submitted to State Clearinghouse)*

Contact Person: Kallie Kull, Senior Planner

Assessor's Parcel: N/A

Application: Routine Flood Control Maintenance Activities

Project Location: East Marin County (Zones 1,3,4,7,9), and County Service Area 13 in Upper Lucas Valley

Project Description: The Marin County Flood Control and Water Conservation District's (MCFCWCD) Routine Maintenance Activities (RMA) program defines the scope and timing of the maintenance activities conducted annually in and around flood control channels and facilities in East Marin County. The RMA program covers five types of routine flood control maintenance activities: 1) Vegetation management; 2) Sediment and debris removal; 3) Erosion control; 4) Maintenance and repair of flood control structures; and 5) Levee maintenance. The primary purpose of the program is to reduce the potential risk of flooding and associated damage to adjacent properties and infrastructure such as bridges, culverts, roads and flood control facilities. The RMA program establishes programmatic guidance to conduct these maintenance activities for flood control purposes while avoiding and minimizing environmental impacts.

This is to advise that the Marin County Flood Control and Water Conservation District Director approved the above-described project on February 16, 2012, and has made the following determinations regarding the above described project:

1. The project in its approved form will not have a significant effect on the environment.
2. A Mitigated Negative Declaration was prepared for this project pursuant to the provisions of CEQA.
3. Mitigation measures were made a condition of the approval of the project.
4. Findings were made pursuant to the provisions of CEQA.

I certify that a copy of the Negative Declaration of Environmental Impact and record of project approval is on file and may be examined at:

Agency: Marin County Department of Public Works

Address: 3501 Civic Center Drive, Room 304, San Rafael, CA 94903

POSTED 6/6/12 TO 7/5/12

By: _____ Date: 6/4/12

Robert Beaumont, Director,
Marin County Flood Control and Water Conservation District

The filing of this Notice of Determination starts a 30 day statute of limitations on court challenges to the approval under CEQA.

N-12-06 NCE-12-124

NEGATIVE DECLARATION

Marin County
Environmental Coordination and Review

Pursuant to Section 21000 et. seq. of the Public Resources Code and the Marin County Environmental Impact Review Guidelines and Procedures, a Negative Declaration is hereby granted for the following project.

1. **Project Name:** **Marin County Flood Control Routine Maintenance Activities Program**

2. **Location and Description:** **Eastern Marin County Flood Control Zones 1, 3, 4, 7, 9, and Community Service Area 13 in Upper Lucas Valley**

The Marin County Flood Control and Water Conservation District's (MCFCWCD) Routine Maintenance Activities (RMA) program defines the scope and timing of the maintenance activities conducted annually in and around flood control channels and facilities in East Marin County. The MCFCWCD is responsible for maintenance of 37 miles of stream channels, two sediment basins, and numerous flood control facilities throughout East Marin County (e.g. weirs, tide gates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, culverts, outfalls, storm drains and pump station inlet/outlet structures). The RMA program covers five types of routine flood control maintenance activities: 1) Vegetation management; 2) Sediment and debris removal; 3) Erosion control; 4) Maintenance and repair of flood control structures; and 5) Levee maintenance. The primary purpose of the program is to reduce the potential risk of flooding and associated damage to adjacent properties and infrastructure such as bridges, culverts, roads and flood control facilities. The RMA program does not include projects requiring individual agency permits, such as larger capital improvement projects (e.g. building a new pump station), large dredging projects (e.g. dredging the mainstem of Novato Creek), or new bank stabilization projects using only hardened materials such as rock rip rap. The RMA program establishes programmatic guidance to conduct these maintenance activities for flood control purposes while avoiding and minimizing environmental impacts. The program provides the organizational framework to ensure that routine maintenance work complies with the terms of State and Federal regulations and permit conditions to protect water quality, wetlands and riparian habitats.

3. **Project Sponsor:** **Marin County Flood Control and Water Conservation District**

4. **Finding:** **Based on the attached Initial Study and without a public hearing, it is my judgment that:**

☐ The project will not have a significant effect on the environment.

☒ The significant effects of the project noted in the Initial Study attached have been mitigated by modifications to the project so that the potential adverse effects are reduced to a point where no significant effects would occur.

Rachel Warner
Marin County Environmental Coordinator

Date: 2/14/12

Based on the attached Initial Study and the comments received during the public review period, the Marin County Department of Public Works grants a Negative Declaration.

Robert Beaumont, Director
Marin County Flood Control and Water Conservation District

Date: 6/4/12

5. Mitigation Measures:

(Select one of the following statements)

☐ The Initial Study did not identify any potential adverse impacts and, therefore, the project does not require mitigation measures.

☒ Please refer to mitigation measures in the attached Initial Study.

☐ The Initial Study concludes that the Department can modify the project's potential adverse impacts, as noted under the following factors in the attached Initial Study.

The Department of Public Works has incorporated into the project all of the mitigation measures described in the attached Initial Study.

6. Preparation:

The Marin County Flood Control and Water Conservation District prepared this Negative Declaration and interested parties may obtain copies at the address listed below.

Kallie Kull, Senior Planner
Marin County Department of Public Works
3501 Civic Center Drive, Room 304
San Rafael, CA 94903

Monday through Friday
8:30 a.m. to 4:30 p.m.
Telephone (415) 473-6528

MARIN COUNTY FLOOD CONTROL AND WATER CONSERVATION DISTRICT

DRAFT INITIAL STUDY

Marin County Flood Control District
Routine Maintenance Activities Program

I. BACKGROUND

A. Project Sponsor's Name and Address: Marin County Flood Control District
3501 Civic Center Drive, Room 304
San Rafael, CA 94903

B. Lead Agency Name and Address: Marin County Flood Control District
3501 Civic Center Drive, Room 304
San Rafael, CA 94913-4186

C. Contact Person and Phone Number: Kallie Kull; Senior Planner, (415) 499-6532

II. PROJECT DESCRIPTION

A. Project Title: Marin County Flood Control District: Routine Maintenance Activities Program (RMA)

B. Type of Application(s): Flood Control Routine Maintenance Projects

C. Project Location: The geographic extent of the RMA program includes routine maintenance activities carried out in and around creeks, channels, ditches, levees, flood control structures and facilities, located within six project areas: one each for five flood control zones in East Marin County (Zones 1,3,4,7,9), and County Service Area 13 in Upper Lucas Valley (See Figure 1):

Flood Control Zone 1 – Novato
Flood Control Zone 3 – Richardson Bay
Flood Control Zone 4 – Bel Aire and Strawberry Circle
Flood Control Zone 7 – Santa Venetia
Flood Control Zone 9 – Ross Valley
County Service Area 13 – Upper Lucas Valley

Refer to:
Figure 1: Map of County Flood Control Zones and CSA/CSD areas included in the project
Attachment A: Maps 1-12 of Project Areas and Species of Concern
Attachment B: Master list of Project Areas and RMA Activities
Attachment C: Master List of all Sediment Removal Sites

D. General Plan Designation: The proposed project area is vast in extent and includes creeks which are located within the mapped City Centered and Coastal Baylands Corridors of East Marin (Countywide Plan 2007) and within Streamside Conservation Areas (SCAs).

E. Zoning: Project areas within the RMA program fall into the land use and zoning categories of Residential, General Commercial/Mixed Use, Office/Commercial Mixed Use, Neighborhood/Commercial Mixed- Use/ Recreational Commercial, Industrial, Agricultural, Public and Open Space Lands.

PROJECT AREA

The Marin County Flood Control District is responsible for maintenance of 37 miles of stream channels, two sediment basins, and numerous flood control facilities (e.g. weirs, tide gates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, culverts, outfalls, storm drains and pump station inlet/outlet structures), throughout East Marin County. The geographic extent of the proposed Routine Maintenance Program (RMA) includes six project areas: one each for five flood control zones (Zones 1, 3, 4, 7 and 9), and one project site in County Service Area 13 in Upper Lucas Valley (*Figure 1*). The Flood Control Zones included in this project are located exclusively in Eastern Marin County. Each zone includes a number of project sites, which are differentiated based on stream reaches and habitat types. In all, there are 93 specific sites where the District performs routine maintenance activities. There are 26 project sites located in Flood Control Zone 1 in the Novato Creek watershed, 33 project sites in Flood Control Zone 3 in Mill Valley, six project sites in Flood Control Zone 4 in Bel Aire/Strawberry, 13 project sites in Flood Control 7 in Santa Venetia, 14 project sites in Flood Control Zone 9 in the Corte Madera Creek watershed, and one project site in County Service Area 13 in Upper Lucas Valley.

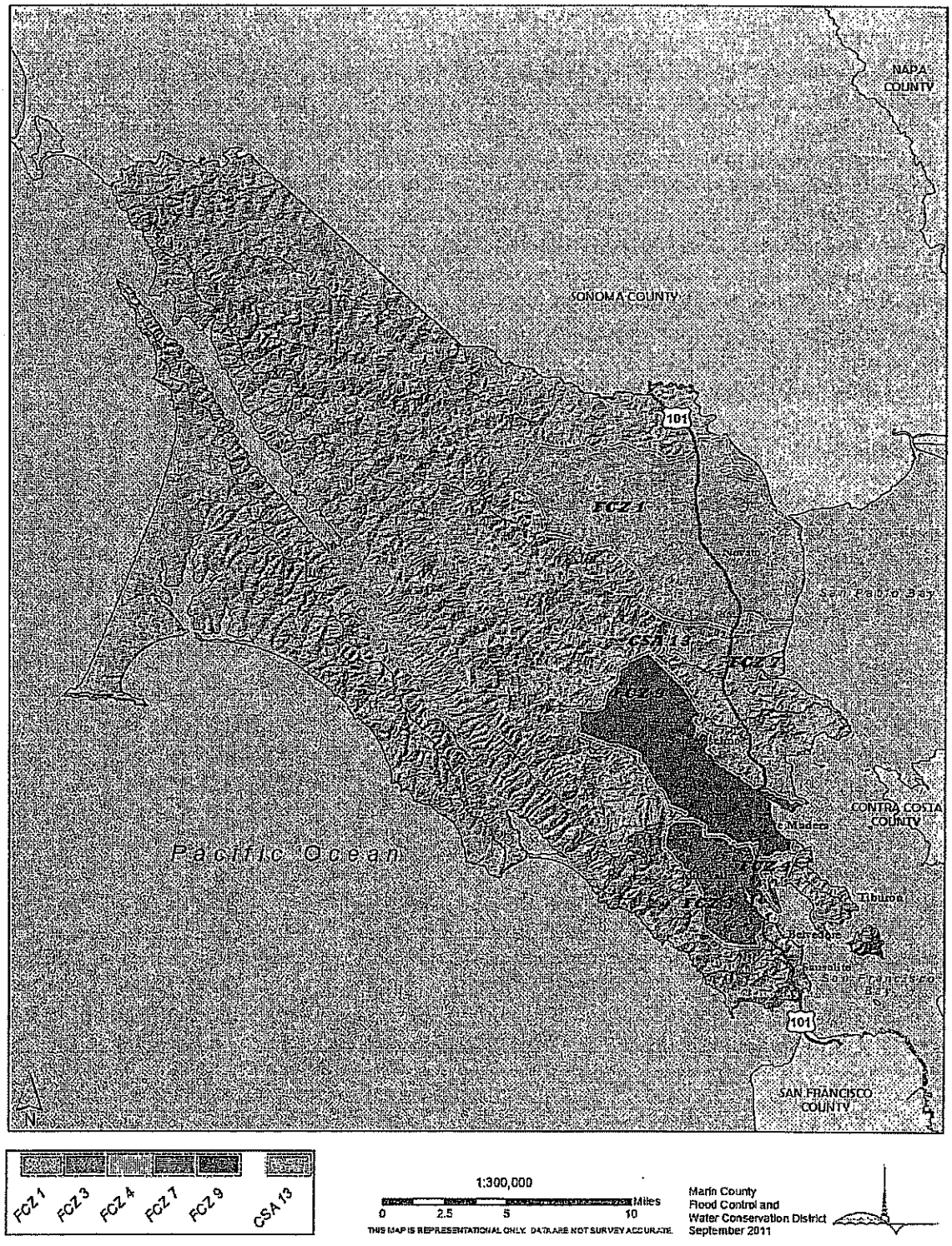

Figure 1. Project areas covered by the Marin County Flood Control District's Routine Maintenance Activities Program; Flood Control Zones 1, 3, 4, 7, 9, and Community Service Area 13 in Upper Lucas Valley, all in East Marin County.

PROGRAM OVERVIEW

Program Purpose

The Marin County Flood Control District's Routine Maintenance Activities Program (RMA) defines the types and scope of the District's annual routine maintenance activities conducted in and around flood control channels and facilities. The primary purpose of the program is to reduce the potential risk of flooding and associated damage to adjacent properties and infrastructure such as bridges, culverts, roads and flood control facilities. The RMA program establishes programmatic guidance to conduct these activities for flood control purposes while avoiding and minimizing environmental impacts. The RMA program provides the organizational framework for flood control staff and managers to oversee maintenance crews and their activities and to ensure that their work complies with the terms of State and Federal regulations and permit conditions to protect water quality, wetlands and riparian habitats. The RMA program does not include projects requiring individual agency permits, such as larger capital improvement projects (e.g. building a new pump station), large dredging projects (e.g. dredging the mainstem of Novato Creek), or new bank stabilization projects using only hardened materials such as rock rip rap. The District will implement the RMA program in a yearly work cycle, to include pre-project notification, project implementation, and annual reporting.

Jurisdictional Boundaries

Maintenance activities are implemented on an annual basis only in locations where the Marin County Flood Control District and/or its municipal partners own the land outright in fee title or holds legal easements; with the exception of four sites on private property, where the District annually receives written landowner permission before performing maintenance activities. No aspect of the RMA program shall be implemented in areas where the County or its municipal partners do not have direct legal jurisdiction or landowner permission.

Environmental Setting

Eastern Marin County watersheds share the same general anatomy: the ridge-tops and upper slopes of the watersheds are in generally protected open space areas, the valley floors are densely developed, and the lower reaches are tidally-influenced and quite flat. The District's 93 RMA sites are located mainly in the valley floors and lower creek reaches. The uplands encompass the hilly, often steep, terrain from the top of the ridges down to where the valleys flatten out. They are dominated by mixed evergreen forest and oak-bay woodlands, interspersed with open annual grasslands, chaparral, and coastal scrub. Much of the upland habitats in Marin County are protected as public and municipal open space. The valley floors are developed with dense residential and commercial developments, often right up to, and sometimes in, the creek channels. The road network can also be quite dense, with many bridges spanning the creeks. In almost all cases, creeks are heavily impacted by historic human use, including concrete channelization and straightening, constrained riparian corridors, impacted floodplains, and non-native invasive species. The lower reaches of creeks have very little topographic relief, they are either tidally influenced and support saltwater or brackish-water marsh, or are protected by levees for agricultural or residential use. While often less developed, these lower marsh areas have altered hydrology and are constrained by roads, levees, and other human-induced development. Freshwater seasonal wetlands have become established in areas that were once historical baylands and which have been diked for agriculture. These seasonal wetlands provide habitat for migratory waterfowl and shorebirds, including California clapper and black rails.

›pe of Work

The RMA program covers five categories of routine flood control maintenance activities:

1) Vegetation management
2) Sediment and debris removal
3) Erosion control
4) Maintenance and repair of flood control structures
5) Levee maintenance

1) Vegetation Management Activities are employed to achieve three main goals:

- maintain channel function
- reduce fire fuels,
- restore creek habitat

These goals are achieved by removing invasive non-native plants and re-vegetating with native plants where necessary to control erosion and maintain riparian habitat. Channel maintenance is achieved by limbing and trimming of riparian trees and shrubs, selective cattail cutting and removing trash. Occasionally trees growing on the channel bed need to be removed because they obstruct flow or divert flow and cause bank erosion. This work is typically limited to the removal of arroyo willow or white alder growing in the center of the channel bed.

Vegetation management activities are performed by crews using hand tools and do not include ground-disturbing ivities. Cattails are removed from selected reaches as part of sediment removal activities. All vegetation maintenance is done without the use of herbicides.

Vegetation management takes place from the channel bottom to the top of the high water mark, and includes trimming limbs from trees and shrubs growing over the channel and trimming branches that hang down into the active channel. The goal of vegetation management within natural channels is to establish a canopy cover that will suppress invasive plant growth and maintain cooler stream temperatures.

Fire fuel reduction is achieved by mowing on tops of banks and levees and the thinning and removal of non-native species such as ivy and Himalayan blackberry. For mowing, crews use weed-eaters for smaller areas and tractors with mowing attachments for larger, more open areas.

Tree removal is a rare event with the exception of non-native trees such as acacia. Once or twice a year crews may need to remove a tree that has died and poses a hazard to adjacent structures or could pose a flood hazard if it falls into the channel. Removal of these trees is conducted in consultation with the Department of Fish and Game.

Removal of non-native vegetation takes place as part of maintaining channel function but also occurs in a more strictly restoration-type activity led by Point Reyes Bird Observatory's STRAW Program (Students and Teachers Restoring a Watershed) in partnership with the Marin County Stormwater Pollution Prevention Program (MCSTOPPP). Students working in the STRAW Program remove invasive non-natives and replant sites with native vegetation. The program has worked at creek sites near schools where access and proximity allow for the removal of all traces of the non-native vegetation and the return to sites to continue maintenance and restoration of the creek corridor. These restoration activities have been ongoing for over 10 years. The partnership with the STRAW Program demonstrates the County's efforts to manage creeks through stewardship of the land. Native plant restoration reduces the maintenance needs in e creeks and allows for better habitat to be established in the urban creek corridors. The students, teachers and parents working in their local creeks increases the community awareness of the habitat and supports the County's watershed-based approach to caring for our creeks.

2) Sediment and Debris Removal

Sediment and debris removal from channels, sediment basins and around flood control facilities (e.g. trash racks) is completed on a routine basis in order to maintain channel function and facilitate unobstructed flow around structures including bridges, storm drain outlets, and pump stations. Excavated sediment is hauled away to a permitted spoils disposal site. Debris items found in the channels and around flood control facilities (e.g. tires, shopping carts, trash, furniture), are typically removed by hand and hauled to a certified disposal site, such as a landfill. Attachment B lists all sediment removal sites included in the RMA program with specific information regarding dimensions of work area, equipment used, location of equipment, and expected duration of work at each site.

3) Erosion Control

Erosion control activities take place only where the District and/or its partners hold fee title to the land. Most large erosion control and large bank stabilization projects are not routine and therefore are not included in the RMA program. The only erosion control projects included in the RMA program are those where a failing streambank is composed of earthen materials and biotechnical engineering techniques are used to stabilize the bank and prevent further erosion (e.g. brush mattresses and willow walls). Erosion control activities will generally be minor in nature and completed in 2-4 days.

4) Maintenance and Repair of Flood Control Structures

Annual routine maintenance and repair of Marin County flood control structures is a key objective of the RMA program. Flood control structures are defined to include all structures built or maintained by the District, including, but not limited to, weirs, tide gates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters culverts, outfalls, storm drain or pump station inlet/outlet structures and similar structures. The maintenance, repair or rehabilitation of flood control structures does not exceed 100 linear feet upstream or downstream of each structure and does not include increasing the footprint of any structure.

5) Levee Maintenance and Repair

Levee maintenance includes mowing levee tops and banks above the high water line for fire fuel reduction, stabilizing levees by placing fill on the levee tops, and controlling burrowing rodent populations. Levee stabilization may occur on any levee maintained by the District; a landowner access agreement is required for activities at site 7-GAL on the Santa Venetia levee, which is private property. If a gopher infestation occurs, the gophers are trapped and their burrows are filled with an earth/concrete mix or bentonite, following FEMA guidelines. The County of Marin does not use rodenticides or other poisons in rodent control for levee maintenance or in any other RMA program activity.

PROGRAM IMPLEMENTATION

Environmental Staff and Oversight

The Marin County Flood Control District will designate environmental staff who will provide day-to-day oversight of the RMA program including: 1) pre-project planning and notification to applicable resource agencies, 2) pre-project surveys for special status wildlife and plant species depending on site location and designated work windows, 3) project implementation including site surveys, conducting crew trainings, and coordinating with crews in the field, and 4) annual reporting to permitting resource agencies. The District will designate Environmental Compliance Coordinators (ECCs) to specifically oversee the biological aspects of the RMA program. The ECCs shall have an understanding of biological resources, permit regulations that may affect listed species and/or water quality, familiarity with the maintenance activities, and how to implement Avoidance and Minimization Measures and BMPs in the field. The ECCs will

ordinate activities with input and review from County of Marin Public Works' staff biologists.

A Biological Assessment (BA) was completed for the RMA program in June 2011, which addresses the project's potential impacts to water quality, wildlife and sensitive native habitats. Based on the findings in the BA, the RMA program specifies appropriate General and Activity-specific Conditions, and species-specific Avoidance and Minimization Measures (AMMs) to be employed at each project site and for each type of maintenance activity. Program implementation also includes employment of existing Best Management Practices (BMPs) from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and the Federal Emergency Management Agency (FEMA).

General and activity-specific conditions, AMMs and BMPs are incorporated into the overall project description and spelled out in the individual project fact sheets for each site. The job of the ECCs is to ensure that all measures are employed as prescribed in the field, depending on the location and nature of the activity.

Schedule and Timing of Maintenance Activities

The Routine Maintenance Activities Program is implemented annually throughout the project area in East Marin County. The general work window for RMA activities is the dry season, from April 15th to October 15th, depending on weather. Dry years may mean a longer work season; wet weather may halt the work season early. Table 1 below shows the Special Status Species potentially found within the project area and the established work windows for each species relative to the proposed work periods. As a general rule, work at each site will be scheduled around relevant work windows to avoid impacts. In instances where work needs to be scheduled outside of an established work window for a particular species in a specific location, species-specific pre-construction surveys will be conducted before maintenance activities commence. Work at a site may be re-scheduled based on survey findings, and/or may require application of oidance and Minimization Measures before proceeding. In all cases, all routine maintenance activities shall be nducted in such a way as to avoid and/or minimize environmental impacts to special status species, sensitive habitats, and water quality.

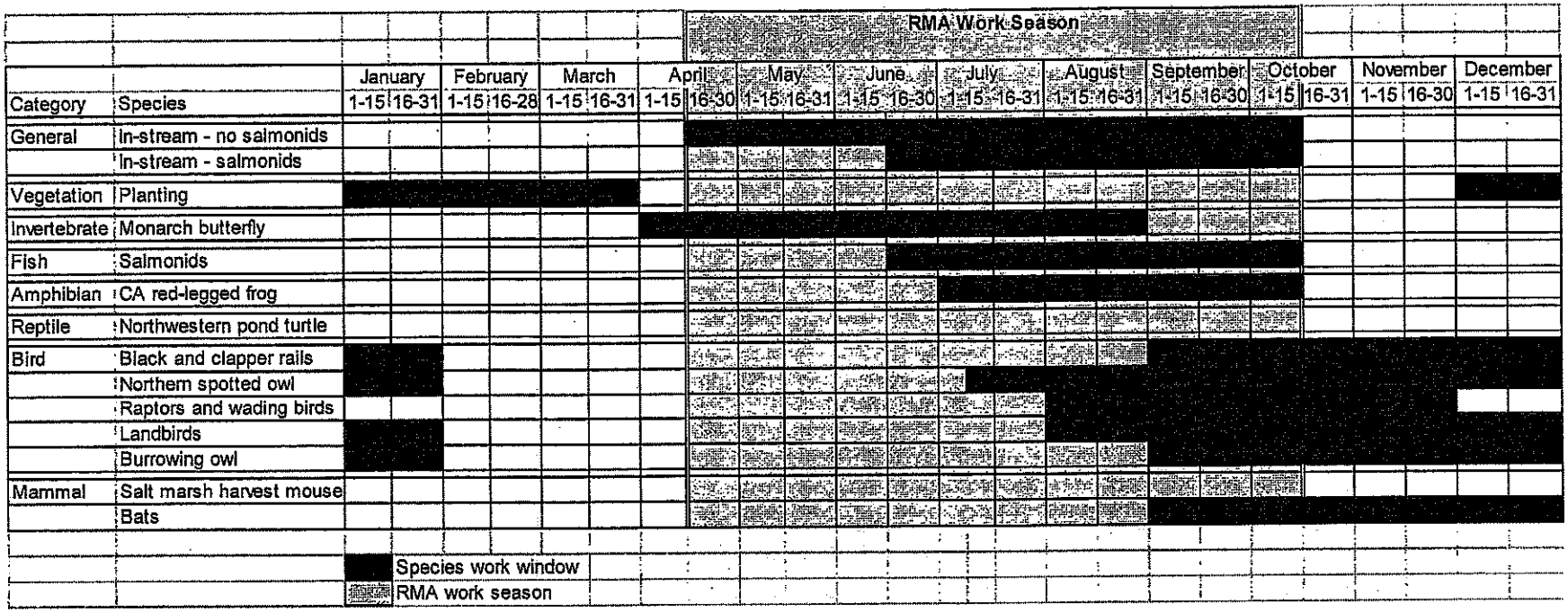

Table 1. Environmental Work Window for Special Status Species relative to the work season for implementation of the RMA Program.

Responsible Parties and Program Partners

Marin County Flood Control and Water Conservation District (District)- The Marin County Flood Control and Water Conservation District is the primary proponent for the RMA program, which utilizes the labor and expertise of the County of Marin Department of Public Works (DPW), County road maintenance crews, Conservation Corps North Bay crews (CCNB), and private contractors to manage and implement routine maintenance activities. The Marin County Flood Control and Water Conservation District (District) was formed in 1955 by an act of the California State Legislature with the primary purpose of controlling flood and storm waters of streams which flow within and into the county. The Marin County Board of Supervisors sits as its board and the District is staffed by the County of Marin Department of Public Works (DPW). The boundaries of the District are contiguous with those of the county and eight flood control zones have been established to address specific issues related to flooding within individual watersheds.

County of Marin Department of Public Works Road Crew (DPW)- DPW road maintenance crews perform a portion of the vegetation management, sediment removal, erosion control, and facility maintenance activities.

Marin County Parks - *The District coordinates with Marin County Parks to perform vegetation maintenance activities on certain lands under their jurisdiction.*

Conservation Corps North Bay (CCNB)- Conservation Corps North Bay is a non-profit job training and educational organization which has been operating in Marin County since 1982. CCNB will be the primary active partner and contractor with the District for many of the activities included in the RMA program. CCNB Maintenance Supervisors and staff will be trained annually by the District staff to incorporate the general and activity-specific conditions, AMMs, and BMPs required for each activity at each site in order to protect water quality, habitat and special status species.

Municipal Partners- Cities of Mill Valley, Novato, Larkspur, Ross, Fairfax, and San Anselmo- In addition to the work it oversees directly on County unincorporated lands, the District has a formal agreement with the City of Mill Valley that enables the City of Mill Valley to perform routine flood control maintenance activities on an annual basis on properties that fall within the District's flood control easements. In Novato, the District performs flood control maintenance activities in areas within the City of Novato's jurisdiction. The District is currently negotiating similar agreements for the District to conduct maintenance activities on a routine basis within the smaller municipalities of the Ross Valley (Cities of Larkspur, Ross, San Anselmo and Fairfax.

MCSTOPPP and STRAW- The District partners with the Marin County Stormwater Pollution Prevention Program (MCSTOPPP) and the Point Reyes Bird Observatory's (PRBO) Students and Teachers Restoring a Watershed (STRAW) to perform restoration work in eastern Marin County. Activities consist primarily of removal of invasive plants and planting of native species by groups of teachers and students organized by STRAW.

Private Contractors - District environmental staff will work with outside contractors prior to implementing activities covered by the RMA. The ECC will be responsible for making sure that hired contractors understand what materials they need to have in hand and what methods to employ when implementing prescribed AMM's and BMPs during and post-construction. Companies contracting with the County of Marin for RMA program activities will be held to standards described in the Specifications that are included in their County contracts.

Foundation Documents for the RMA

The RMA program is largely based on program documents and studies previously developed by the Bay Area Stormwater Management Agencies Association (BASMAA). The District, as a member of MCSTOPPP, has been an active member of BASMAA since 1989. BASMAA is a consortium of 90 Bay Area county and city governments, local water and sanitation districts, and state agencies and was formed in response to the National Pollutant Discharge Elimination System (NPDES) permitting program to promote regional consistency. In 1998, BASMAA formed an Operational Permit Committee (OPC) which worked for several years to develop a Regional General Permit with the USACE to cover routine maintenance activities in flood control channels within BASMAA's jurisdictional areas. Although a Regional General Permit was not obtained, the OPC produced several documents which have been used by several BASMAA members to obtain individual permits. In addition to previous documents developed for BASMAA, the District commissioned a Biologic Assessment for the RMA program. Biological Assessment for Routine Flood Control Maintenance Activities; Marin County, California (July 2011).

The District is utilizing the information in these documents to support programmatic permit applications to the Department of Fish and Game, the Army Corps of Engineers, and the Regional Water Quality Control Board for the RMA program.

- Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Public Works. July 2011.
- Minimal Threat Channel and Basin Maintenance Activities. October 2009. This document describes routine flood control maintenance activities.
- Minimal Threat Flood Control Routine Maintenance Activities: Regional Biological Assessment. October 2006. This document describes the environmental setting, special status species within the BASMAA jurisdictional area, the extent and scope of proposed activities, and a suite of AMMs and BMPs.
- Flood Control Facility Maintenance Best Management Practices: A Manual for Minimizing Environmental Impacts from Stream and Channel Maintenance Activities. June 2000. The manual describes BMPs for equipment and vehicles, sediment control, soil stabilization, natural resource protection and restoration, vegetation and debris management, and water diversions.

III. CIRCULATION AND REVIEW

A. Responsible Agencies: *(agencies whose approval is required and permits needed)*

- U.S. Army Corps of Engineers – Section 404 permit under the Clean Water Act with consultation from the U.S. Fish and Wildlife Service (Endangered Species Act of 1973, as amended) and NOAA Fisheries (Endangered Species Act of 1973, as amended);
- San Francisco Bay Regional Water Quality Control Board – Section 401 Water Quality Certification; and
- California Department of Fish and Game - 1600 Streambed Alteration Agreement Programmatic Routine Maintenance Agreement.

DOCUMENTS INCORPORATED BY REFERENCE

The following is a list of relevant information sources, which have been incorporated by reference into the foregoing Initial Study pursuant to Section 15150 of the State CEQA Guidelines. The number assigned to each information source corresponds to the number listed in parenthesis following the incorporating topical question of the Initial Study checklist. These documents are both a matter of public record and available for public inspection at the County of Marin. Copies of Documents (1-2) below are available for public review at the County of Marin Planning Department (Room 308), 3501 Civic Center Drive, San Rafael, California, Monday through Friday between the hours of 8:00 a.m. to 4:00 p.m. Copies of documents (3-8) are available for public review at the Marin County Public Works Department (Room 304) or at the Marin County website www.marinwatersheds.org. Copies of Documents (9 – 10)) can be found on-line at the individual municipal websites.

1) Marin Countywide Plan, Marin County Community Development Agency, Planning Division (2007).

2) Marin County Code; Supp. No. 6-11, Update 1; (June 7, 2011).

3) A Programmatic Approach to Routine Flood Control Maintenance Activities; County of Marin (October 2011).

4) Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Public Works. (October 2011).

5) Minimal Threat Channel and Basin Maintenance Activities. BASMAA OPC (October 2009).

6) Minimal Threat Flood Control Routine Maintenance Activities: Regional Biological Assessment. BASMAA OPC October 2006.

7) Flood Control Facility Maintenance Best Management Practices: A Manual for Minimizing Environmental Impacts from Stream and Channel Maintenance Activities. BASMAA OPC, (June 2000).

8) County Road Maintenance Guidelines for Protecting Aquatic Habitat and Salmon Fisheries; FishNet 4C; Dec 2004; updated 2007)

9) City of Mill Valley General Plan (1989).

10) City of Novato General Plan (1996).

IV. EVALUATION OF ENVIRONMENTAL IMPACTS AND MITIGATION MEASURES

Pursuant to Section 15063 of the State CEQA Guidelines, and the County EIR Guidelines, Marin County will prepare an Initial Study for all projects not categorically exempt from the requirements of CEQA. The Initial Study evaluation is a preliminary analysis of a project which provides the County with information to use as the basis for deciding whether to prepare an Environmental Impact Report (EIR) or Negative Declaration. The points enumerated below describe the primary procedural steps undertaken by the County in completing an Initial Study checklist evaluation and, in particular, the manner in which significant environmental effects of the project are made and recorded.

A. The determination of significant environmental effect is to be based on substantial evidence contained in the administrative record and the County's environmental database consisting of factual information regarding environmental resources and environmental goals and policies relevant to Marin County. As a procedural device for reducing the size of the Initial Study document, relevant information sources cited and discussed in topical sections of the checklist evaluation are incorporated by reference into the checklist (e.g. general plans, zoning ordinances). Each of these information sources has been assigned a number which is shown in parenthesis following each topical question and which corresponds to a number on the data base source list provided herein as Attachment A. See the sample question below. Other sources used or individuals contacted may also be cited in the discussion of topical issues where appropriate.

B. In general, a Negative Declaration shall be prepared for a project subject to CEQA when either the Initial Study demonstrates that there is no substantial evidence that the project may have one or more significant effects on the environment. A Negative Declaration shall also be prepared if the Initial Study identifies potentially significant effects, but revisions to the project made by or agreed to by the applicant prior to release of the Negative Declaration for public review would avoid or reduce such effects to a level of less than significance, and there is no substantial evidence before the Lead County Department that the project as revised will have a significant effect on the environment. A signature block is provided in Section VII of this Initial Study to verify that the project sponsor has agreed to incorporate mitigation measures into the project in conformance with this requirement.

C. All answers to the topical questions must take into account the whole of the action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts. Significant unavoidable cumulative impacts shall be identified in Section VI of this Initial Study (Mandatory Findings of Significance).

D. A brief explanation shall be given for all answers except "Not Applicable" answers that are adequately supported by the information sources the Lead County Department cites in the parenthesis following each question. A "Not Applicable" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g. the project falls outside a fault rupture zone). A "Not Applicable" answer shall be discussed where it is based on project-specific factors as well as general standards (e.g. the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).

E. "Less-than-significant Impact" is appropriate if an effect is found to be less-than-significant based on the project as proposed and without the incorporation of mitigation measures recommended in the Initial Study.

F. "Potentially Significant Unless Mitigated" applies where the incorporation of recommended mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less-than-significant Impact." The Lead County Department must describe the mitigation measures, and briefly explain how they reduce the effect to a less-than-significant level (mitigation measures from Section V, "Earlier Analyses", may be cross-referenced).

F. "Significant Impact" is appropriate if an effect is significant or potentially significant, or if the Lead County Department lacks information to make a finding that the effect is less-than-significant. If there are one or more effects which have been determined to be significant and unavoidable, an EIR shall be required for the project.

G. The answers in this checklist have also considered the current California Environmental Quality Act Guidelines and the Initial Study Checklist contained in those Guidelines.

H. This Initial Study checklist was prepared consistent with current California Environmental Quality Act Guidelines and the Initial Study checklist contained in those Guidelines.

V. ISSUES *(for source #(s) see: Documents Included by Reference; Page 13)*

1. LAND USE AND PLANNING. *Would the proposal:*

a) Conflict with applicable Countywide Plan designation or zoning standards? (source #(s): 1, 2)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The determinations of policy consistency as discussed in this Initial Study section represent County staff interpretation of policies. However, this Initial Study does not determine policy consistency. The County decision-makers make the formal policy consistency determinations.

Section 15358(b) of the CEQA Guidelines states that "effects analyzed under CEQA must be related to a physical change in the environment", however policy inconsistencies may not necessarily indicate significant environmental effects Therefore, only those policy inconsistencies that would lead to a significant effect on the physical environment are considered significant impacts pursuant to CEQA. Where potentially significant environmental impacts are raised in the discussion below, they have been mitigated to a less-than-significant impact and, therefore, project activities are determined to be consistent with the relevant policies cited. Mitigations are addressed further in the topical impact sections following the plan, policies and regulations analyses.

LOCAL PLANS, POLICIES, AND REGULATIONS

Land use designations and development of the project sites are governed by the objectives and policies of the 2007 Marin Countywide Plan (CWP), sections of the Marin County Code, including Title 22 (Zoning) and Title 23 (Natural Resources) and Title 24 (Development Standards). And General Plans for local municipal program partners including; City of Novato, City of Mill Valley, Town of Ross, City of Larkspur, Town of San Anselmo and the Town of Fairfax.

MARIN COUNTY CODE

TITLE 22- DEVELOPMENT CODE; Chapter 22.27- Native Tree Protection and Preservation

Section 22.27.040 (k)- Exemption to the Prohibition of Removal of a Protected Tree states that the project proponent must demonstrate that the tree removal is by a public agency to provide for the routine management and maintenance of public land.

Consistent- The project is consistent with the Marin County Code (Title 22) which requires projects to minimize tree removal and grading, as well as to maintain adequate site features that establish the visual character of the site. Marin County Flood Control District during RMA Program implementation, will minimize any riparian tree removal unless absolutely necessary to achieve the goals of the program, which are to protect the public and public facilities from flooding, while protecting water quality and sensitive habitats. To protect sites that are environmentally sensitive, the District will employ a suite of Avoidance and Minimization

Measures and Best Management Practices to protect existing habitats and species of concern. Therefore, the project is consistent with the development standards set forth in Title 22.

TITLE 23- NATURAL RESOURCES;

The provisions of Title 23 are enacted to protect and promote the public health, safety and general welfare, to preserve environmental qualities, and to protect the value, worth and enjoyment of the use of real property to the fullest extent possible, through the regulation of the uses or activities of the property in a manner which will prevent serious public injury.

Chapter 23.08 Excavating, Grading, and Filling
Chapter 23.08 establishes regulations for excavation, grading and filling in order to:

(1) Preserve and enhance the natural beauties of the land, streams, bays and shorelines;
(2) Reduce or eliminate the hazards of earth slides, mudflows, rock falls, undue settlement, erosion, siltation, sedimentation and flooding;
(3) Protect and enhance the water quality of watercourses, water bodies and wetlands and vegetation for wildlife habitat;
(4) Regulate de facto development caused by uncontrolled grading.

Activities of this nature which are considered exempt from the provisions of this chapter include:
(a) Grading done by or on behalf of a public agency that assumes full responsibility for the work.

Consistent: The project as described will be implemented by the County of Marin Flood Control District, local municipalities or private contractors under contract with the District. The District is a public agency and assumes full responsibility for the work conducted under the RMA program, therefore the program is exempt from the terms of Chapter 23.08, and consistent with the requirements of this section of County code.

Chapter 23.09 Floodplain Management
It is the purpose of Chapter 23.09 to promote the public health, safety and general welfare and to minimize the losses described in this section by provisions designed to:

(A) Protect human life and health;
(B) Minimize expenditure of public money for flood control projects;
(C) Minimize the need for rescue and relief efforts associated with flooding and generally undertaken at the expense of the general public;
(D) Minimize prolonged business interruptions;
(E) Minimize damage to public facilities and utilities, such as water located in areas of special flood hazard;
(F) Help maintain a stable tax base by providing for the second use and development of areas of special flood hazard so as to minimize future flood blight areas;
(G) Ensure that potential buyers are notified that property is in an area of special flood hazard; and
(H) Ensure that those who occupy the areas of special flood hazard assume responsibility for their actions.

(2) In order to accomplish its purposes, Chapter 23.09 includes methods and provisions for:

(A) Restricting uses which are dangerous to health, safety and property due to water or erosion hazards, or which result in damaging increases in erosion or in flood heights or velocities;
(B) Requiring that uses vulnerable to flood, including facilities which serve such uses, be protected against flood damage at the time of initial construction;
(C) Controlling the alteration of natural floodplains, stream channels, and natural protective barriers, which help accommodate or channel floodwaters;
(D) Controlling filling, grading, dredging and other development which may increase flood damage; and
(E) Preventing or regulating the construction of flood barriers which will unnaturally divert floodwaters or which may increase flood hazards in other areas.

Consistent- The project is consistent with the Marin County Code Title 23 which was enacted to protect and promote the public health, safety and general welfare, and to preserve environmental qualities in a manner which would prevent serious public injury. The objective of the project is to promote flood control and minimize risk to public health, safety and welfare. The program as designed will minimize potential impacts to sensitive habitats and will be designed to blend into the surrounding natural environment to the greatest extent feasible. The proposed flood control project incorporates practices which enhance the biological and visual character of the creek corridor. Although some trimming of riparian trees will occur to prevent flooding, the project will not alter the riparian character of the project sites. The implementation of the proposed program will respect the surrounding natural environment and return channel elevations to their previous condition prior to sedimentation.

In summary, the proposed project is maintenance in nature, and will not change the Land Use Designations at the project sites or conflict with zoning standards or the objectives of the above-mentioned code in any way; therefore, the project will be consistent with applicable Marin County Code.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Conflict with applicable environmental plans or policies adopted by Marin County? (source #(s): 1)	[ ]	[X]	[ ]	[ ]

MARIN COUNTYWIDE PLAN (2007)

Specific Countywide Plan policies which pertain to the proposed project are associated with the following subjects:

(1) Include Resource Preservation in Environmental Review;
- BIO- 2.1 Include Resources Protection in Environmental Review

(2) Coordinate with Trustee Agencies and Promote Early Consultation with Agencies;
- BIO-2.8 Coordinate with Trustee Agencies during environmental review when special-status species, sensitive natural communities, or wetlands may be affected.
- BIO-2.9 Promote early consultation with other agencies.

(3) Protection of Riparian Systems

- BIO-1.5 Promote Use of Native Plant Species
- BIO-1.7 Remove Invasive Exotic Plants
- BIO-1.8 Restrict Use of Herbicides, Insecticides, and Similar Materials
- BIO-4.6 Control Exotic Vegetation
- BIO-4.7 Protect Riparian Vegetation

(4) Protection of Stream Conservation Areas

- BIO- 4.4 Promote Natural Stream Channel Function
- BIO-4.5 Restore and Stabilize Stream Channels
- BIO-4.10 Promote Interagency Cooperation
- BIO-4.19 Maintain Channel Stability

(5) Species and Habitat Preservation

- BIO-1.1 Protect Wetlands, Habitat for Special -Status Species, Sensitive Natural Communities, and Important Wildlife Nursery Areas and Movement Corridors.
- BIO-1.3 Protect Woodlands, Forests, and Tree Resources
- BIO-2.4 Protect Wildlife Nursery Areas and Movement Corridors.
- BIO-2.5 Restrict Disturbance in Sensitive Habitat During Nesting Season
- BIO-2.7 Protect Sensitive Coastal Habitat.
- BIO-5.3 Leave Tidelands in the Natural State
- BIO-5.5 Protect Freshwater Habitats
- BIO-5.6 Use Flood Basins for Seasonal Habitat

(6) Protection of Watersheds and Water Quality

- WR-1.1 Protect Watersheds and Aquifer Recharge
- WR-2.3 Avoid Erosion and Sedimentation
- WR-2.4 Design County Facilities to Minimize Pollutant Input

(7) Avoidance of Environmental Hazards

- EH-2.1. Avoid Hazard Areas
- EH-3.2. Retain Natural Conditions
- EH-4.1. Limit Risks to Structures
- EH-4.2 Remove Hazardous Vegetation

(8) Protection of Air Quality

- AIR-2.0 Protection from Emissions
- AIR-5.0 Adaptation to Climate Change

(9) Minimize Noise Impacts;

- NO-1.3 Regulate Noise Generating Activities

(10) Protection of Visual Resources

- DES-4.1. Preserve Visual Quality

(11) Avoid Impacts to Historical Resources;

- HAR-1.3. Avoid Impacts to Historical Resources

CONSISTENCY OF PROJECT WITH EXISTING MARIN COUNTYWIDE PLAN POLICIES

(1) Include Resource Preservation in Environmental Review

BIO-2.1 Include Resource Preservation in Environmental Review *to assess the impact of proposed development on native species and habitat diversity, particularly special-status species, sensitive natural communities, wetlands, and important wildlife nursery areas and movement corridors. Require adequate mitigation measures for ensuring the protection of any sensitive resources and achieving "no net loss" of sensitive habitat acreage, values, and functions.*

Consistent: The Marin County Department of Public Works (DPW) developed a biological assessment for the RMA program which evaluated potential impacts to native species, habitat diversity and special-status species and natural communities (Biological Assessment for Routine Flood Control Maintenance Activities; July 2011). The objective of the biological assessment was to identify adequate measures to protect any sensitive resources and achieve "no net loss" of sensitive habitat acreage, values, and functions. Prescriptions contained in the Biological Assessment include species related Avoidance and Minimization Measures as well as Special Conditions and Best Management Practices to be employed during project implementation. The project is guided by these prescriptions from the Biological Assessment so therefore, the project will be consistent with Policy BIO-2.1.

(2) Coordinate with Trustee Agencies and Promote Early Consultation with Other Agencies

BIO-2.8 Coordinate with Trustee Agencies. *Consult with trustee agencies (the California Department of Fish and Game, U.S. Fish and Wildlife Service, National Oceanic and Atmospheric Administration (NOAA) Fisheries, U.S. Army Corps of Engineers, Environmental Protection Agency, Regional Water Quality Control Board, and Bay Conservation and Development Commission) during environmental review when special-status species, sensitive natural communities, or wetlands may be adversely affected.*

BIO-2.9 Promote Early Consultation with Other Agencies. *Require applicants to consult with all agencies with review authority for projects in areas supporting wetlands and special-status species at the outset of project planning.*

Consistent: DPW has coordinated the development and review of this project and its associated environmental documents with natural resource trustee agencies who require permits for the proposed work. Permitting agencies include the San Francisco Bay Regional Water Quality Control Board (SFBRWQCB), the California Department of Fish and Game for all sites. A select number of sites will need permits from the U.S. Army Corps of Engineers with consultation with U.S. Fish and Wildlife Service, and the National Marine Fisheries Service. Regulatory permit applications have been submitted to all these agencies. Project coordination with these regulatory agencies and notification to all interested parties and the general public will continue throughout the public review process. Therefore, the project is consistent with Policies BIO-2.8 and BIO-2.9.

(3) Protection of Riparian Systems

BIO-1.5 Promote Use of Native Plant Species. *Encourage use of a variety of native or compatible non-native, non-invasive plant species indigenous to the site vicinity as part of project landscaping to improve wildlife habitat values.*

BIO-1.7 Remove Invasive Exotic Plants. *Require the removal of invasive exotic specie, to the extent feasible, when considering applicable measures in discretionary permit approvals for development projects unrelated to agriculture, and include monitoring to prevent re-establishment in managed areas.*

BIO-1.8 Restrict Use of Herbicides, Insecticides, and Similar Materials. *Encourage the use of integrated pest management and organic practices to manage pest with the least possible hazard to the environment. Restrict the use of insecticide, herbicides, or any toxic chemical substance in sensitive habitats, except when an emergency has been declared; the habitat itself is threatened; a substantial risk to public health and safety exists, including maintenance for flood control; or such use is authorized pursuant to a permit issues by the agricultural commissioner. Encourage non-toxic strategies for pest control, such as habitat management using physical and biological control, as an alternative to chemical treatment, and allow use of toxic substances only after approaches have been tried and determines unsuccessful. Continue to implement the Integrated Pest Management ordinance for county-related operations.*

BIO- 4.6 Control Exotic Vegetation. *Remove and replace invasive exotic plants with native plants as part of stream restoration projects and as a condition of site-specific development approval in than SCA and include monitoring to prevent reestablishment.*

BIO-4.7 Protect Riparian Vegetation. *Retain riparian vegetation for stabilization of stream banks and floodplains, moderating water temperatures, trapping and filtering sediments and other water pollutants, providing wildlife habitat, and aesthetic reasons.*

Consistent: Vegetation management activities are employed to achieve three main goals: maintain channels, reduce fire fuels, and restore creek habitat by removing invasive non-native plants and re-vegetating with native plants. Maintaining channel function is achieved by limbing and trimming, cattail cutting, removing vegetation from channel bottoms, and clearing trash. These activities occur from the channel bottom to the top of the high water mark, and include trimming tree limbs from trees and shrubs growing in the channel and trimming branches that hang down into the active channel. These activities employ vegetation control methods such as cutting and removing vegetation above the ground by hand or with loppers, hand saws, chainsaws, pole saws, weed eaters and other hand tools. Bladed weed-eaters are used to cut cattails. Fire fuel reduction is achieved by mowing on tops of banks and levees, removal of fallen trees, removal of standing dead trees, and thinning and removal of non-native species such as ivy and Himalayan blackberry. For mowing, crews use weed-eaters for smaller areas and tractors with mowing attachments for larger, more open areas. Tree removal and thinning employ a mix of tools including chainsaws, loppers, hand saws, pole saws, hedge trimmers, and other hand tools.

Tree removal is a rare event. Program BIO-4f of the Countywide Plan recognizes that tree growth may be cleared from the stream channel where removal is essential to protect against property damage or prevent safety hazards Removal of mature, healthy, native trees is only indicated when pruning is insufficient to reduce unacceptably high hydraulic roughness in the channel. For

example, an arroyo willow growing on a newly established gravel bar may need to be removed if it threatens to block flow through a structure. Removal of sick, dying, or dead trees is indicated when they reduce channel capacity, increase flood hazard, and/or are a safety hazard to adjacent structures. Tree health and hazard potential will be determined by appropriate environmental staff (arborist or biologist). Snags shall be left in place to provide habitat for birds and small mammals if they do not otherwise pose a flood or safety hazard. Staff will consult with CDFG whenever possible if tree removal is necessary, and retention of large wood debris in the creeks will follow CDFG protocols.

Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program. Since 1999 STRAW has restored 7,159 linear feet (5.9 acres) of riparian corridor along east Marin creeks, removing invasive non-native plants and revegetating with natives to restore streamside habitat. The STRAW Program is included as a partner in the Marin County Flood Control District's Routine Maintenance Program (RMA).

Overall, the vegetation removal within flood control creeks and drainages will be the minimum amount necessary to clear these areas of obstructions. As discussed in detail in Sections V. 7, the proposed project will adhere to the mitigation measures outlined in that section, ensuring that the project would have less-than-significant impacts on riparian systems or the plants and animals that inhabit the riparian zone. Therefore, the project has been mitigated to consistency with Policies BIO-1.5, BIO-1.7, BIO-1.8, BIO-4.6 and BIO-4.7.

(4) Protection of Stream Conservation Areas

BIO-4.1 Restrict Land Use in Stream Conservation Areas. *A Stream Conservation Area (SCA) is established to protect the active channel, water quality and flood control functions, and associated fish and wildlife habitat values along streams. Development shall be set back to protect the stream and provide an upland buffer, which is important to protect significant resources that may be present and provide a transitional protection zone. Best management practices shall be adhered to in all designated SCAs. Best management practices are also strongly encouraged in ephemeral streams not defined as SCAs.*

Allowable uses in SCAs in any corridor consist of the following, provided they conform to zoning and all relevant criteria and standards for SCAs, as follows:

- Existing permitted or legal nonconforming structures or improvements, their repair, and their retrofit within the existing footprint;
- Projects to improve fish and wildlife habitat;
- Driveway, road and utility crossings, if no other location is feasible;
- Water monitoring installations;
- Passive recreation that does not significantly disturb native species;
- Necessary water supply and flood control projects that minimize impacts to stream function and to fish and wildlife habitat;
- Agricultural uses that do not result in any of the following:
  a. The removal of woody riparian vegetation;

b. The installation of fencing within the SCA that prevents wildlife access to the riparian habitat within the SCA;
c. Animal confinement within the SCA; and
d. A substantial increase in sedimentation.

BIO-4.4 Promote Natural Stream Channel Function. *Retain and, where possible, restore the hydraulic capacity and natural functions of stream channels in SCAs. Discourage alteration of the bed or banks of the stream, including filling, grading, excavating, and installation of storm drains and culverts. When feasible replace impervious surfaces with pervious surfaces. Protect and enhance fish habitat, including through retention of large woody debris, except in cases where removal is essential to protect against property damage or prevent safety hazards. In no case shall alterations that create barriers to fish migration be allowed on streams mapped as historically supporting salmonids. Alteration of natural channels within SCAs for flood control shall be designed and constructed in a manner that retains and protects the riparian vegetation, allows for sufficient capacity and natural channel migration, and allows for reestablishment of woody trees and shrubs without compromising the flood flow capacity where avoidance of existing riparian vegetation is not possible.*

BIO- 4.5 Restore and Stabilize Stream Channels. *Pursue stream restoration and appropriate channel redesign where sufficient right-of-way exists that includes the following: a hydraulic design, a channel plan form, a composite channel cross-section that incorporates low flow and bankfull channels, removal and control of invasive exotic plant species, and bio-technical bank stabilization methods to promote quick reestablishment of riparian trees and other native vegetation.*

BIO-4.10 Promote Interagency Cooperation. *Work in close cooperation with flood control districts, water districts, and wildlife agencies in the design and choice of materials for construction and alterations within SCAs.*

Consistent: Many of the channels included in the project areas are subject to protection under the Stream Conservation Area protection policies as set forth in the Countywide Plan. As discussed in Section V. 3. (c) And V. 11. (d, e), the proposed project is a flood control project that will maintain functioning channels for conveyance of water flow, minimize impacts to fish and wildlife habitat and reduce risk of fire and flooding. Thus, it is a permitted activity within the SCA, as set forth in the Countywide Plan Policy BIO-4.1 Excavation of accumulated sediment, selective vegetation removal within the creeks, channels and drainage ditches at the project sites, and minimal streambank stabilization where needed will work to restore the hydraulic and natural functions of project drainages to reduce the risk of flooding, thus the project is consistent with Polices BIO-4.4 and 4.5. The project promote interagency cooperation in that it will be implemented by the Marin County Flood Control District in collaboration with local municipalities including the Cities of Mill Valley, Larkspur, Ross, San Anselmo, Fairfax and Novato. Permits for the project will be issued by the trustee agencies including the Department of Fish and Game, the US Army Corps of Engineers, the Regional Water Quality Control Board, the US Fish and Wildlife Service and the National Marine Fisheries Service.

(5) Species and Habitat Preservation

BIO-1.1 Protect Wetlands, Habitat for Special-Status Species, Sensitive Natural Communities, and Important Wildlife Nursery Areas and Movement Corridors. *Protect sensitive biological resources, wetlands, migratory species of the Pacific Flyway, and wildlife movement corridors through careful environmental review of proposed development applications, including consideration of cumulative impacts, participation in comprehensive habitat management programs with other local and resource agencies, and continue acquisition and management of open space lands that provide for permanent protection of important natural habitats.*

BIO-1.3 Protect Woodlands, Forests, and Tree Resources. *Protect large native trees, trees with historical importance; oak woodlands; healthy and safe eucalyptus groves that support colonies of monarch butterflies, colonial nesting birds, or known raptor sites; and forest habitats. Prevent the untimely removal of trees through the implementation of standards in the Development Code and Native Tree Preservation and Protection Ordinance. Encourage other local agencies to adopt tree preservation ordinances to protect native trees and woodlands, regardless of whether they are located in urban or undeveloped areas*

BIO-2.4 Protect Wildlife Nursery Areas and Movement Corridors. *Ensure that important corridors for wildlife movement and dispersal are protected as a condition of discretionary permits, including consideration of cumulative impacts. Features of particular importance to wildlife for movement may include riparian corridors, shorelines of the coast and bay, and ridgelines. Linkages and corridors shall be provided that connect sensitive habitat areas such as woodlands, forests, wetlands, and essential habitat for special-status species, including an assessment of cumulative impacts.*

BIO-2.5 Restrict Disturbance in Sensitive Habitat During Nesting Season. *Limit construction and other sources of potential disturbance in sensitive riparian corridors, wetlands, and baylands to protect bird nesting activities. Disturbance should generally be set back from sensitive habitat during the nesting season from March 1 through August 1 to protect bird nesting, rearing, and fledging activities. Pre-construction surveys should be conducted by a qualified professional where development is proposed in sensitive habitat areas during the nesting season, and appropriate restrictions should be defined to protect nests in active use and ensure that any young have fledged before construction proceeds.*

BIO-2.7 Protect Sensitive Coastal Habitat. *Protect coastal dunes, streams, and wetlands, and sensitive wildlife habitat from development in accordance with coastal resource management standards in the development code.*

BIO-5.1 Protect the Baylands Corridor. *Ensure that baylands and large, adjacent essential uplands are protected, and encourage enhancement efforts for baylands, including those in the baylands corridor.*

BIO-5.3 Leave Tidelands in Their Natural State. *Require that all tidelands be left in their natural state to respect their biological importance to the estuarine ecosystem. Any modifications should be limited to habitat restoration or enhancement plans approved by regulatory agencies.*

BIO-5.5 Protect Freshwater Habitats. *Preserve and where possible expand habitats associated with freshwater streams, seasonal wetlands, and small former marshes to facilitate the circulation, distribution, and flow of fresh water, and to enhance associated habitat values.*

BIO-5.6 Use Flood Basins for Seasonal Habitat. *Utilize natural or manage man-made flood basins to provide seasonal habitat for waterfowl and shorebirds and prohibit development in these basins to protect habitat values.*

Consistent: A Biological Assessment (BA) was completed for the RMA program in June 2011, which addresses the project's potential impacts to water quality, wildlife and sensitive native habitats. Based on the findings in the BA, the RMA program specifies appropriate General and Activity-specific Conditions, and species-specific Avoidance and Minimization Measures (AMMs) to be employed at each project site and for each type of maintenance activity. Program implementation also includes employment of existing Best Management Practices (BMPs) from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and the Federal Emergency Management Agency (FEMA).

General and activity-specific conditions, AMMs and BMPs are incorporated into the overall RMA project description and spelled out in the individual project fact sheets for each site. An Environmental Compliance Coordinator (ECC) will work with the project on a daily basis to ensure that all AMMs and BMPs are implemented as prescribed in the field, depending on the location and nature of the activity. The ECC will be on-site to monitor the outcome of all conservation measures to assure protection of all fish and wildlife species and their habitats

As prescribed in the Biological Assessment, pre-construction surveys for special-status animal and plant species will be completed at individual sites as necessary depending on work windows and seasonal conditions. If surveys confirm species occurrence at a project site, a biologist will oversee all construction work and implement appropriate conservation measures to protect these species. If necessary, avoidance of work areas and stop work orders will be employed if impacts to sensitive species and their habitat cannot be mitigated to a less-then-significant level or avoided completely. As discussed in detail in Sections V. 7. (a, b, c), the proposed project, will adhere to the mitigation measures outlined in those sections, ensuring that the project would have less-than-significant impacts on all special-status species, wildlife and habitat diversity. Therefore, the project has been mitigated to consistency with Policies BIO-1.1, BIO-1.3, BIO-2.4, BIO-2.5, BIO-2.7.

Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program. Since 1999 STRAW has restored 7,159 linear feet (5.9 acres) of riparian corridor along east Marin creeks, removing invasive non-native plants and revegetating with natives to restore streamside habitat. The STRAW Program is included as a partner in the Marin County Flood Control District's Routine Maintenance Program (RMA).

Sensitive natural communities are those that are considered rare in the region, support special-status plant or wildlife species, or receive regulatory protection (i.e., §404 of the Clean Water Act and/or the §§1600 et seq. of the California Fish and Game Code). Within the project sites, two

sensitive natural communities have the potential to be affected by project activities: northern coastal salt marsh and coastal brackish marsh (CDFG 2011). These communities are found within or adjacent to some of the project sites and are expected to fall under federal and/or state jurisdictions as wetlands or waters of the U.S. or waters of the state. Wetlands and Other Waters of the U.S. Wetlands and other aquatic resources such as riparian areas and certain aquatic vegetation communities are considered sensitive biological resources and can fall under the jurisdiction of several regulatory agencies. Wetlands are generally defined by the USACE as "those areas that are inundated or saturated by surface or ground water… that under normal circumstances support a prevalence of vegetation typically adapted for life in saturated soil conditions" (33 CFR 328.3 [b]). Indicators of three wetland parameters determined by field investigation must be present for a site to be classified as a wetland by the USACE; these are hydric soils, hydrophytic vegetation, and wetlands hydrology. Approximately one third of the sites have been initially identified as possibly meeting the USACE definition of wetlands. A formal wetlands delineation for those 38 sites will be completed in Spring or Summer 2012. Mitigation measures to protect these sites are outlined in Section 7 below. In tideland areas maintenance work will be limited to that which is absolutely necessary to restore flow through to the tidelands from upland drainage areas (e.g. clearing sediment from culvert outfalls). The minimal amount of work proposed in the tidelands area will be conditioned by permits issued by the Department of Fish and Game (1600 Streambed Alteration Agreement) and the Army Corps of Engineers (404 permit), with consultation from US Fish and Wildlife Service the National Marine Fisheries Service, and the Regional Water Quality Control Board (401 Certification). General and activity-specific conditions, AMMs and BMPs prescribed for all project sites located in tideland areas will mitigate the project's impacts to less-than-significant, therefore, the project will be consistent with Policies BIO-5.1, BIO-5.3, BIO-5.5, and BIO-5.6.

(6) Protection of Watersheds and Water Quality

WR-1.1. Protect Watersheds and Aquifer Recharge. *Give high priority to the protection of watersheds, aquifer-recharge areas, and natural drainage systems in any consideration of land use.*

WR-2.3. Avoid Erosion and Sedimentation. *Minimize soil erosion and discharge of sediments into surface runoff, drainage systems, and water bodies. Continue to require grading plans that address avoidance of soil erosion and on-site sediment retention. Require developments to include on-site facilities for the retention of sediments, and; if necessary, require continued monitoring and maintenance of these facilities upon project completion.*

WR-2.4 Design County Facilities to Minimize Pollutant Input. *Design, construct, and maintain County building, landscaped areas, roads, bridges, drainages, and other facilities to minimize the volume of toxic, nutrients, sediment, and other pollutants in stormwater flows, and continue to improve road maintenance methods to reduce erosion and sedimentation potential.*

Consistent: Implementation of this project will help to restore the normal drainage patterns within the project area by removing accumulated sediment from the creeks, channels and drainage ditches at selected sites. There will be a temporary increase in turbidity in these drainages as sediment is disturbed from the dredging process. These impacts will be short-term and localized over the 1-7 day sediment removal project period. DPW will use Best Management Practices (BMPs) outlined in the Bay Area Stormwater Management Agencies Association (BASMAA) Manual and FishNet4C Guidelines for Protecting Aquatic Habitat and Salmon Fisheries for County Road Maintenance. These BMPs include minimizing loss of

native vegetation, conducting the work from the road whenever possible, timing the work prior to the rainy season; minimizing sediment disturbance and suspension within the water, taking all excavated material to an upland disposal site, and sediment/erosion controls to keep excess soil from washing or blowing away during removal, transport and storage (including sediment traps, silt fences, coir logs and wattles containing weed-free rice straw, as necessary). Dewatering will be conducted in a manner to reduce turbidity downstream of the project area. To prevent streambed erosion from the use of cofferdams, pipes and pumps used to de-water the creek, diversion pipe outlets shall be placed on hard surfaces or temporary outfall dissipation structures shall be installed (i.e. rock piles). No phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start-up of any phase of the project that may result in sediment run-off to the stream. If rainfall is predicted, erosion control measures must be kept on-site and be in place prior to the onset of precipitation. As discussed in detail in Sections V. 3. (b) and V. 4. (c), the proposed project will adhere to the mitigation measures outlined in those sections, ensuring that the project would have less-than-significant impacts on water quality and watersheds. Therefore, the project has been mitigated to consistency with Policies WR-1.1, 2.3 and 2.4.

(7) Avoidance of Environmental Hazards

EH-2.1. Avoid Hazard Areas. *Require development to avoid or minimize potential hazards from earthquakes and unstable ground conditions.*

EH-3.2. Retain Natural Conditions. *Ensure that flow capacity is maintained in stream channels and floodplains, and achieve flood control using biotechnical techniques instead of storm drains, culverts, riprap, and other forms of structural stabilization.*

EH-4.2 Remove Hazardous Vegetation. *Abate the build-up of vegetation around existing structures or on vacant properties that could help fuel fires.*

Consistent: The RMA project is maintenance in nature and no new development or increases of footprint of existing development is proposed; therefore no increase in impacts from an earthquakes on structures is predicted for the project. This project will restore the channel function of these drainages by removing obstructing vegetation and accumulated sediment, which should reduce the potential for flooding of adjacent roadways and promote public safety of people and property from the risks associated with flooding. The proposed bank stabilization associated with the RMA uses biotechnical designs and does not include installation of rip rap or other forms of structural stabilization. Bank stabilization and channel clearing activities will be implemented in a way that maintains natural channel features and watershed functions. Mowing of levees and along top of bank in selected channel reaches is done before the July 4th holiday in order to reduce fire fuel loading and to minimize the risk of grass fires, therefore, the project will be consistent with Policies EH-2.1, 3.2 and 4.2.

(8) Protection of Air Quality

AIR-2.0. Protection from Emissions. *Minimize the potential impacts from land uses that may emit pollution and/or odors on residential and other land uses sensitive to such emissions in unincorporated Marin County.*

AIR-5.0 Adaptation to Climate Change- Adopt policies and programs that promote resilient human and natural systems in order to ease the impacts of climate change.

Consistent: The effects on air quality are from exhaust coming from heavy equipment during dredging. These impacts are short-term and temporal, occurring incrementally over the 1-7 day work periods. As discussed in Section V. 5.(a), the project would contribute minimally to air impacts; no significant negative impacts related to air quality are identified. The re-vegetation of stream banks by the STRAW program serves to sequester carbon and thus reduce the impacts of climate change. Consequently, the proposed project will be consistent with Policy AIR-2.1.

(9) Protection of Open Space and Trails

Policy TRL-1.1. Protect the Existing Countywide Trail System. Maintain the existing countywide trail system and protect the public's right to access it.

Consistent: The project will not impede access to the Countywide Trail System in any way nor will it create any impacts that will decrease the public's enjoyment of the trail system or open space areas in any way, therefore it is consistent with the Countywide Plan Policies to protect open space and trails.

(10) Minimize Noise Impacts

NO-1.3. Regulate Noise Generating Activities. Require measures to minimize noise exposure to neighboring properties, open space, and wildlife habitat from construction-related activities, yard maintenance equipment, and other noise sources, such as amplified music.

Consistent: As discussed in Section V. 10. (a, b), the noise associated with sediment removal activities is limited to the sound of heavy equipment operating during normal daytime working hours (approximately 8:00 a.m. to 4:00 p.m.). The project is short-term (approximately 1-7 days, depending on site), most of the work is not near residences and for those that are, private landowners have concurred with implementation of this flood control maintenance project on their lands and project dates will be coordinated with these landowners in advance of project commencement. Noise impacts could cause temporary disturbance to wildlife species such as songbirds that use the riparian zone. Any disturbed or flushed resident wildlife are expected to return to the project area after completion of daily construction activities. The project would contribute minimally to noise impacts; no significant impacts related to noise pollution are identified. Therefore, the project will be consistent with Policy NO-1.3.

(11) Protection of Visual Resources

DES-4.1. Preserve Visual Quality Protect scenic quality and views of the natural environment – including ridgelines and upland greenbelts, hillsides, water, and trees – from adverse impacts related to development.

Consistent: The visual resources of the project sites would not be adversely impacted by maintenance activities because the overall project is designed to respect the surrounding natural environment and return it to its previous condition (i.e., by removing aggraded sediment, fallen

trees or overgrown weeds). Some trimming of riparian trees will occur, but the maintenance project would not result in visual impacts to public or scenic views and vistas from adjacent roadways, therefore, the project will be consistent with Policy DES-4.1.

(12) Avoid Impacts to Historical Resources

HAR-1.3. Avoid Impacts to Historical Resources. Ensure that human activity avoids damaging cultural resources.

Consistent: As discussed in Sections V. 14. (a, b), the proposed project will disturb only aggraded sediment that has been carried from the upper watershed down through the stream and channel system, and some sites to be dredged have previously been dredged multiple times in the same locations. Should any cultural resources be discovered during sediment removal activities, all work shall immediately be stopped and the services of a qualified archaeologist from Sonoma State University's Cultural Resources Department shall be engaged to assess the value of the resource and to develop appropriate mitigation measures. As discussed in detail in Sections V. 14. (a), the proposed project will adhere to the mitigation measures outlined in that section, ensuring that the project would have less-than-significant impacts on historical resources. Therefore, the project has been mitigated to consistency with Policy HAR-1.3.

CITY OF MILL VALLEY GENERAL PLAN (1989)

Section 5: Public Health and Safety; PH-1: The City shall strive to ensure that all grading, site improvements and structures minimize geotechnical, seismic and flood hazards to people and property.

A large portion of developed and undeveloped Mill Valley lands are subject to flooding due to a combination of factors including periodic heavy winter rainfalls, tidal fluctuations, and potentials for tsunami and dam failure due to seismic activity. Flooding as a result of heavy rainfall can result from either of two phenomena: (1) storm water run-off inundation of lowlands due to an inadequate drainage network, and (2) high Bay tides and winds which force the storm water up stream channels. Mill Valley drains into the Richardson Bay Drainage Basin mainly by way of the Basin's major stream, Arroyo Corte Madera Del Presidio. The creek often overflows its banks in the lower reaches during a period of heavy rainfall. Significant encroachment has occurred along Arroyo Corte Madera by urban development and excessive vegetative growth. Both factors have imposed extreme limitations on channel flow capacities along substantial portions of the stream, resulting in major flood problems. Damaging floods have periodically occurred over this area as a result.

Consistent: The primary objective of the proposed RMA project within the City of Mill Valley's jurisdiction is to reduce the potential risk of flooding by maintaining the channels and removing obstructions from related flood control infrastructure such as tidegates, weirs and trash racks; therefore the RMA program is consistent with the PH-1 Policy of the City of Mill Valley General Plan.

CITY OF NOVATO GENERAL PLAN (1996)

The City of Novato General Plan contains the following policies to protect Watercourses, Wetlands, and Baylands Areas that are applicable to the proposed RMA activities that will be conducted on properties within the City of Novato jurisdiction.

CHAPTER IV- Environment; Watercourses, Wetlands, and Baylands Areas

EN Objective 1– Preserve, protect, and enhance streams and other bodies of water.

EN Policy 1 Ecology of Creeks and Streams. *Preserve and enhance the ecology of creeks and streams.*

EN Policy 2 Vegetation in Watercourse Areas. *Protect vegetation in watercourse areas.*

EN Policy 3 Wildlife Habitat. *Endeavor to preserve and enhance wildlife habitat areas in watercourse areas and control human use of these areas as necessary to protect them.*

EN Policy 4 Erosion Control. *Minimize soil disturbance and surface runoff in the Stream Protection Zones. Pursuant to the City's grading ordinance, work in and adjacent to the zones shall be conducted during the dry season only, at times when the Community Development Department determines that surface runoff will be minimal or containable.*

EN Policy 5 Habitat Restoration. *Restore damaged portions of riparian areas to their natural state, wherever feasible.*

EN Policy 7 Water Quality. *Encourage protection of water resources from pollution and sedimentation, and preserve their environmental and recreation values. count the project's size and cumulative impacts.*

EN Policy 8 Environmentally Sound Flood Control Measures. *Encourage flood control measures that retain the natural features and conditions of watercourses to the maximum feasible extent.*

EN Objective 2- Preserve, protect, and enhance wetlands.

EN Policy 9 Determination of Wetlands. *Recognize the U.S. Army Corps of Engineers (ACE) as the designated permitting agency that regulates wetlands. In regulating wetland activities, the ACE consults with other agencies and organizations including but not limited to U.S. Fish and Wildlife and State Department of Fish and Game.*

EN Policy 10 Wetlands Ecology. *Preserve and enhance wetlands ecology.*

EN Objective 3- Preserve, protect and enhance historic bayland areas.

EN Policy 12 Bayland Area Protection. *Regulate development in the Bayland Overlay Zone so that it does not encroach into wetlands or sensitive wildlife habitats, provided that this regulation does not prevent all use of a property. Discourage human activity that damages fisheries, or habitat for birds, fish or other wildlife.*

EN Objective 4 - Preserve and protect native plant and animal species and their habitat.

EN Policy 18 Species Diversity and Habitat. *Protect biological resources that are necessary to maintain a diversity of plant and animal species.*

EN Policy 19 Special Status Species. *Cooperate with State and Federal Agencies to ensure that development does not substantially adversely affect special status species appearing on the State or Federal list for any rare, endangered, or threatened species. The environmental documentation will screen for the Federal Candidate Species, plants listed on lists 1A, 1B, or 2 of the California Native Plant Society (CNPS), inventory of rare and endangered vascular plants of California and animals designated by CDFG as species of special concern or their current equivalent.*

CHAPTER V- Safety and Noise

SF Objective 3- Reduce flood hazards.

SF Policy 6 Cooperation with Marin County. *Continue to work with the Marin County Public Works Department to minimize negative impacts of storm runoff.*

SF Policy 8 Reducing Flood Hazards. *Reduce flood risk by maintaining effective flood drainage systems and regulating construction.*

SF Policy 9 Storm Drainage System. *Maintain unobstructed water flow in the storm drainage system.*

***Consistent*:** The proposed project is consistent with City of Novato General Plan policies listed above, since the primary objective of the RMA project is to reduce the potential risk and hazards associated with flooding and to maintain unobstructed flow in the storm drainage systems. During all RMA activities Avoidance and Minimization Measures and BMPs will be implemented to protect and enhance the streams and wetlands within the project area and native habitat found within these systems. Therefore the RMA program is consistent with the Policies EN 1, 2, 3, 4, 5, 7, 8, 9, 10, 12, 18, and 19 and SF 6, 8 and 9.

LAND USE AND PLANNING Section 1- (*continued...*)

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Affect agricultural resources, operations, or contracts (e.g. impacts to soils or farmlands, impacts from incompatible land uses, or conflicts with Williamson Act contracts)? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not change any agricultural resources, operation or contracts; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Disrupt or divide the physical arrangement of an established community (including a low-income or minority community)? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not divide or affect the physical arrangement of the established communities; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
e) Result in substantial alteration of the character or functioning of the community, or present or planned use of an area? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not alter the character or function of the community and will actually be a benefit to the community by reducing the potential frequency of flooding; therefore, the project will result in less-than-significant impacts.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
f) Substantially increase the demand for neighborhood or regional parks or other recreational facilities, or affect existing recreational opportunities? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not increase demand for parks or other facilities, therefore this is a less-than-significant impact.

2. **POPULATION AND HOUSING.** ***Would the proposal:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Increase density that would exceed official population projections for the planning area within which the project site is located as set forth in the Countywide Plan and/or community plan? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not have an effect on population nor density of housing; therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Induce substantial growth in an area either directly or indirectly (e.g. through projects in an undeveloped area or extension of major infrastructure)? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not have an effect on growth of an area either directly or indirectly; therefore the project will result in less-than-significant impacts.

c) Displace existing housing, especially affordable housing? (source #(s): 1)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not displace existing housing of any kind; therefore, the project will result in a less-than-significant impact.

3. GEOPHYSICAL. ***Would the proposal result in or expose people to potential impacts involving:***

a) Location in an area of geologic hazards, including but not necessarily limited to: 1) active or potentially active fault zones; 2) landslides or mudslides; 3) slope instability or ground failure; 4) subsidence; 5) expansive soils; 6) liquefaction; 7) tsunami ; or 8) similar hazards? (source #(s): 1)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

This is a routine flood control maintenance project, which will not result in the building of any structures, not increase the vulnerability of other structures to geologic hazards, nor diminish stability of structures within the project area. Rather, the maintenance activities will add to the protection of the public and public infrastructure from potential geologic hazards by increasing channel function and removing debris from culverts and around flood control infrastructure such as trash racks and pump stations. Therefore the project will result in less-than-significant impacts.

b) Substantial erosion of soils due to wind or water forces and attendant siltation from excavation, grading, or fill? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[X]	[ ]	[ ]

This is a flood control maintenance project with primary objectives to remove vegetation, debris and accumulated sediment to maintain channel function and facilitate unobstructed flow around public infrastructure including bridges, storm drains, trash racks, and pump stations. Another aspect of the project is to prevent bank erosion and sedimentation into adjacent creek channels. The only sediment that will be excavated is below water line in creeks, channels sediment basins and drainage ditches; there will be no excavating or grading of adjacent channel banks, and no permanent fill is involved in the project unless it is related to a bio-engineered streambank stabilization project. Each activity includes prescribed Best Management Practices (BMPs), which are mandated to be employed during and after project implementation. Erosion control BMPs are implemented to keep soil from leaving the work sites. During work activities there may be a temporary increase in turbidity in drainages as sediment is disturbed from the dredging process and potential water quality impacts could have a negative effect

upon aquatic life. Avoidance and minimization measures to protect threatened and endangered species and sensitive habitats are discussed in Section V. 7 (a). Implementation of the following mitigation measures are incorporated into the project description and will decrease the impacts of erosion and sedimentation to a less than significant level.

MITIGATION MEASURES

V.3 (b)-1. The District shall designate an Environmental Compliance Coordinator (ECC) to oversee the implementation of the RMA in the field. Before commencement of a maintenance activity, the ECC shall review Site Fact Sheets for specific information on the type, location and extent of the activity and associated areas of disturbance and determine the Avoidance and Minimization Measures and Best Management Practices (BMPs) to implement prior to the maintenance activity. The ECC shall distribute the Site Fact Sheet to the Maintenance Supervisor five days before beginning the maintenance activity.

V.3 (b)-2. Erosion control BMPs shall be incorporated into each project to minimize the discharge of sediments and other pollutants downstream and to prevent channel or streambank erosion or destabilization once the activity has been completed. Erosion control measures shall be monitored during and after storm events and modifications shall be made, if needed.

V.3 (b)-3. If a maintenance activity may cause the introduction of sediments into the stream, no phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start up of any phase of the project that may result in sediment run-off to the stream. All associated erosion control measures must be kept on-site and be in place prior to the onset of precipitation. After any storm event, the ECC shall inspect all sites under construction and all sites scheduled to begin construction within the next 72 hours, for erosion and sedimentation problems and take corrective action as needed.

V.3 (b)-4. DPW shall construct the project in a manner that reduces turbidity and protects water quality, resident fish and other aquatic species. To prevent streambed erosion from the use of temporary cofferdams, pipes and pumps used to de-water the creek channel, diversion pipe outlets would be placed on hard surfaces or outfall protection in the form of rock or similar material would be installed. These temporary cofferdams shall be secured with plastic sheeting and anchored in place. All temporary fill for construction of cofferdams, pumps, pipes and sheet plastic shall be removed from the stream after project completion and the creeks shall be restored to their natural condition.

V.3 (b)-5. No debris, soil, silt, sand, cement, concrete, or washings thereof, or other construction related materials or wastes, oil or petroleum products or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into waters of the State. When operations are completed, any excess material that may be washed into waters of the State shall be removed from the work area and transported to a legal upland spoils disposal site.

MITIGATION MONITORING MEASURES

V.3(b)-1-5. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

		Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c)	**Substantial changes in topography from excavation, grading or fill, including but not necessarily limited to: 1) ground surface relief features; 2) geologic substructures or unstable soil conditions; and 3) unique geologic or physical features?** (source #(s): 3)	[ ]	[ ]	[X]	[ ]

A long-term objective of this maintenance project is to restore natural channel formation and to decrease the potential risk and frequency of flooding. A localized change in stream channel and sediment basin topography will occur through the removal of sediment within the creek channels and drainages. It shall be the minimum amount needed to restore natural channel function and facilitate unobstructed flow conditions. Given the nature of the project, the changes in channel topography are desired outcomes. Given that the sediment to be removed is caused by deposition of eroded sediment from the upper watershed into the lower flood control drainages, impacts to these channels from excavation should be positive in nature. Consequently, the project will result in less-than-significant impacts.

4. WATER. *Would the proposal result in*:

		Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a)	**Substantial changes in absorption rates, drainage patterns, or the rate and amount of surface runoff?** (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Drainage patterns and rate of surface run-off into drainages within the project area from the upper watersheds and adjacent neighborhoods will remain unaltered. The removal of sediment and obstructing vegetation from these channels will increase the channel's ability to carry surface run-off during high flood flows and improve connectivity between downstream and upstream habitats. If the channels have greater functional ability after maintenance has been performed, the potential risk of flooding of adjacent roads and property will be reduced. Consequently, the project will result in less-than-significant impacts.

		Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b)	**Exposure of people or property to water related hazards, including, but not necessarily limited to: 1) flooding; 2) debris deposition; or 3) similar hazards ?** (source #(s): 3)	[ ]	[ ]	[X]	[ ]

This is a flood control project which will decrease potential for flood hazards caused by vegetation or debris deposition around culverts, trash racks, pump stations, and tide gates during high flows. By removing vegetation and sediment from the channels, ditches and sediment basins identified within the project area, the channels will be altered to improve natural channel function and decrease the threat of potential flooding of adjacent roads and property. The project will have an overall beneficial effect on preventing potential flood hazards and debris deposition; consequently the project will result in less-than-significant impacts.

c) **Discharge of pollutants into surface or ground waters or other alteration of surface or ground water quality (e.g. temperature, dissolved oxygen or turbidity)?** (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[X]	[ ]	[ ]

This is a routine flood control maintenance project with the primary objective to remove vegetation and accumulated sediment to maintain channel function and unobstructed flow around structures including bridges, storm drain outlets, and pump stations, and to maintain stable stream banks where necessary. The only sediment that will be excavated is below water line in creeks, channels and drainage ditches; there will be no excavating or grading of adjacent channel banks, and no permanent fill is involved in the project. Each activity includes prescribed Best Management Practices (BMPs), which are mandated to be employed during and after project implementation. The BMPs are designed to keep soil from leaving the work sites (erosion control BMPs) and to repair collapsing stream banks which often contribute to siltation of streams (bio-engineered stream bank repair BMPs). During implementation there may be a temporary increase in turbidity as sediment is disturbed by the dredging process. Potential water quality impacts could have a negative effect upon water quality and aquatic life. Potential impacts to threatened and endangered species that are present within or near the project site area are discussed in Section V.7(a). Implementation of the following mitigation measures will decrease the risk of impacts of erosion or siltation to water quality and aquatic resources and will reduce these impacts to less than significant.

MITIGATION MEASURES

V.4(c)-1. The District shall implement maintenance activities in a manner that reduces turbidity and protects water quality, resident fish and other aquatic species. No debris, soil, silt, sand, cement, concrete, or washings thereof, or other construction related materials or wastes, oil or petroleum products or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into waters of the State. When operations are completed, any excess material shall be removed from the work area and transported to a legal upland spoils disposal site.

V.4(c)-2. Appropriate BMPs shall be incorporated into each project to minimize the re-suspension and discharge of sediments and other pollutants downstream and to prevent channel or streambank erosion or destabilization once the activity has been completed. BMPs to be implemented for each type of activity are referenced in the program documents and prescribed in the Project Fact Sheets for each site. Erosion control measures shall be monitored during and after storm events and modifications made, if needed. BMPS to be implemented are taken from the the Bay Area Stormwater Management Agencies Association (BASMAA) Manual and the FishNet4C Guidelines for Protecting Aquatic Habitat and Salmon Fisheries for County Road Maintenance.

V.4(c)-3. To prevent streambed erosion from the use of cofferdams, pipes and pumps used to de-water the creek, diversion pipe outlets shall be placed on hard surfaces or temporary outfall dissipation structures shall be installed (i.e. rock piles). Temporary cofferdams shall be secured with plastic sheeting and anchored in place. All temporary fill for construction of cofferdams, pumps, pipes and sheet plastic shall be removed from the stream after project completion and the creeks shall be restored to their natural condition.

V.4(c)-4. No phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start up of any phase of the project that may result in sediment run-off to the stream. If rainfall is predicted, erosion control measures must be kept on-site and be in place prior to the onset of precipitation. After any storm event, the Environmental Compliance Coordinator shall

inspect all sites under construction and all sites scheduled to begin construction within the next 72 hours, for erosion and sedimentation problems and take corrective action as needed.

MITIGATION MONITORING MEASURES

V.4(c)-1-6. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Substantial change in the amount of surface water in any water body or ground water either through direct additions or withdrawals, or through intersection of an aquifer by cuts or excavations? (source #(s): 3)	[ ]	[X]	[ ]	[ ]

A select set of sites within the project will need to be temporarily dewatered for equipment access for sediment removal and bank stabilization aspects of the project and to protect special status species such as steelhead trout. Creek flows will be diverted by the construction of temporary cofferdams around the active construction site and water will be transported from upstream to downstream reaches via pumps and pipes/hoses. The cofferdams will be constructed with native materials, including sand bags, gravel bags or equivalent materials and be sealed and secured with plastic sheeting and anchored in place. There will be temporary impacts on water resources within these creek channels during the dewatering process. This impact will be short-term and localized but has the potential to adversely affect aquatic resources in the project area. Threatened and endangered species that are present or near the project site are discussed in Section V.7.(a) and applicable mitigations are proposed to protect these species during dewatering. Implementation of the following best management practices will decrease the risk of impacts to water resources resulting from the dewatering process and reduce these impacts to less than significant.

MITIGATION MEASURES

V.4(d)-1. The District shall construct the projects in a manner that protects fish and other aquatic resources and avoids loss of their habitat. A biologist shall oversee project work and implement any necessary conservation measures to protect these species, including pre-construction surveys and rescue and relocation to suitable upstream or downstream habitat.

V.4(d)-2. Cofferdams used to divert water shall be constructed with clean river gravel or sand bags and sealed with sheet plastic. Intakes and outlets should be designed to minimize turbidity and the potential to wash contaminants into the stream. If a work site is to be temporarily dewatered by pumping, intakes should be completely screened with wire mesh not larger than 5 millimeters to prevent amphibians from entering the pump system. On salmonid streams, the intake pipe shall be fitted with fish screens meeting CDFG and NOAA Fisheries' criteria to prevent entrainment or impingement of small fish (National Marine Fisheries Service 1997). A filtration/settling system must be included to reduce downstream turbidity (i.e. filter fabric, turbidity curtain). The selection of an appropriate system is based on the rate of discharge. If feasible, water that is pumped into a pipe should discharge onto the top of bank into a densely vegetated area, which may require extra hose length. Once the project work is complete, water should be slowly released back into the work area to prevent erosion and decrease turbidity. The channel and soil surface shall be restored to its original or design configuration after the work is complete. Any material added to the channel or basin to provide support for the work approved under

this provision shall be removed unless required for erosion control or habitat enhancement and/or restoration. All cofferdams, pumps, pipes, sheet plastic, silt fences or other non-native materials shall be removed from the stream upon project completion.

V.4(d)-3. Sufficient water shall at all times be allowed to pass downstream to maintain aquatic life below the diversion dam.

V.4(d)-4. For minor actions where the disturbance to construct cofferdams to isolate the work site would be greater than that which would occur in completing the proposed action, measures shall be put in place immediately downstream of the work site to capture suspended sediment. This may include installation of silt catchment fences across the drainage or placement of a straw wattle or filter berm of clean river gravel. Silt fences and other non-native materials shall be removed from the stream following completion of the activity.

MITIGATION MONITORING MEASURES

V.4(d)-1-4. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

e) Substantial changes in the flow of surface or ground waters, including, but not necessarily limited to: 1) currents; 2) rate of flow; or 3) the course or direction of water movements? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The natural direction and rate of flow of groundwater will remain unchanged. The natural direction of flow of the creeks and channels will not change, but the rates of surface flow in some areas may increase with the decreased coefficient of friction resulting from the removal of sediment. As the channel function is increased, there may be a decrease in flood flows coming from the creeks and channels onto adjacent roads and properties, which is the objective of the project. Therefore, this is a less-than-significant impact.

f) Substantial reduction in the amount of water otherwise available for public water supplies? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not reduce the amount of water supply available to the public; therefore, this is a less-than-significant impact.

5. **AIR QUALITY.** ***Would the proposal:***

a) **Generate substantial air emissions that could violate official air quality standards or contribute substantially to an existing or projected air quality violation? (source #(s): 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only air pollutants that will be produced will come from the exhaust fumes from the heavy equipment used for the maintenance project. Since the work will occur out in the open air and over a short duration in each project area (1-7 days, depending on project site), the impact on air quality will be less-than-significant.

b) **Expose sensitive receptors to pollutants, such as noxious fumes or fugitive dust? (source #(s): 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only air pollutants that will be produced will come from the exhaust fumes from the heavy equipment used for the maintenance project. Since the work will occur out in the open air and over a short duration in each project area (1-7 days, depending on project site), the impact to sensitive receptors will be less-than-significant. The impact from dust will be minimal during sediment removal since the work is being done in the wet environment with very little volatile dust, therefore the impact to sensitive receptors will be less-than-significant.

c) **Alter air movement, moisture, or temperature, or cause any change in climate? (source #(s): 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Planting of streamside native vegetation occurs as part of the STRAW Program, serving to decrease stream temperatures, increase carbon sequestration and reduce the impacts of global climate change, therefore, this is a less-than-significant impact.

d) **Create objectionable odors? (source #(s): 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only odors that will be produced will come from the exhaust fumes from the heavy equipment used for the project and potentially smell coming from anaerobic soil conditions in a super saturated environment. The work will occur out in the open air and over a short duration (1-7 days, depending on project site), therefore the impact from objectionable odors will be less-than-significant.

6. **TRANSPORTATION/CIRCULATION.** ***Would the proposal result in:***

a)	**Substantial increase in vehicle trips or traffic congestion such that existing levels of service on affected roadways will deteriorate below acceptable County standards? (source #(s): 3)**	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [ ]	**Less Than Significant Impact** [X]	**Not Applicable** [ ]

The project will deploy vehicles and equipment on a daily basis to the various project sites, where it will remain until the project is completed each day. No substantial increase in vehicular traffic or congestion will occur because of the project. The level of service on affected roadways will not drop below acceptable County standards. These impacts will be minor and are commensurate with currently-occurring traffic impacts associated with routine road maintenance activities along these roads in Marin County. Therefore, this is a less-than-significant impact.

b)	**Traffic hazards related to: 1) safety from design features (e.g. sharp curves or dangerous intersections); 2) barriers to pedestrians or bicyclists; or 3) incompatible uses (e.g. farm equipment)? ((source #(s): 3)**	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

Project implementation will not result in dangerous design features or incompatible uses. Temporary staging of equipment along the road right-of-way could result in the temporary re-direction of vehicle, bicycle and pedestrian traffic. The proposed maintenance project is along County of Marin or local municipality maintained roads and road crews and contractors are experienced at conducting procedures to avoid road traffic hazards. Implementation of the following mitigation measure will decrease the risk of impacts to traffic hazards and reduce these impacts to less than significant.

MITIGATION MEASURES

V.6 (b)-1. The County maintenance crews and any Contractors on the project shall clearly mark alternative routes with traffic control signs during project implementation to ensure public safety.

MITIGATION MONITORING MEASURES

V.6 (b)-1. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

c)	**Inadequate emergency access or access to nearby uses? (source #(s): 3)**	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [ ]	**Less Than Significant Impact** [X]	**Not Applicable** [ ]

Alternative routes shall be clearly marked with County of Marin traffic control signs or communicated on site by County Roads maintenance crews. Emergency vehicles would be given special consideration to provide

unimpeded and continual access to roadways during the maintenance period. Therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Insufficient parking capacity on-site or off-site? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Because equipment will sometimes be staged from the road right-of-way, there could be a temporary loss of pull-out areas used for parking at some sites along project related roads, where staging of County vehicles and equipment could result in the temporary use of part of these pull-out areas. Due to the temporary maintenance nature of the project, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
e) Substantial impacts upon existing transportation systems, including rail, waterborne or air traffic systems? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Due to the temporary maintenance nature of the project, no substantial impacts upon existing transportation systems will occur on or around the project sites. Minor road diversions may be required during project activities, with alternative routes clearly marked with County of Marin traffic control signs or communicated on site by County Roads maintenance crews. Therefore, this is a less-than-significant impact.

7. **BIOLOGICAL RESOURCES.** ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Reduction in the number of endangered, threatened or rare species, or substantial alteration of their habitats including, but not necessarily limited to: 1) plants; 2) fish; 3) insects; 4) animals; and 5) birds listed as special-status species by State or Federal Resource Agencies? (source #(s): 3, 4)	[ ]	[X]	[ ]	[ ]

In order to assess and mitigate for potential impacts to special status species and their habitats, a biologic assessment was conducted which looked at potential impacts of all routine maintenance activities on special status species and their habitats; (Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Public Works, California. July 2011). Those species with a moderate to high potential to occur, or those species prominent in the regulatory environment are discussed in detail in the Biological Assessment and actions to avoid impacts to these species and their habitats are summarized in this section.

Based on quad searches and special status species listings from federal and state agencies searches, 80 special status animal species have been identified as having some potential of occurring within the project sites. Of these, only 16 species, based on literature and database reviews and familiarity with local fauna, are considered likely to occur within the project sites and eight of these are listed as threatened or endangered including:

- Central California Coast coho salmon (*Oncorhynchus kisutch*)
- Central California Coast steelhead trout (*Oncorhynchus mykiss irideus*)
- California red-legged frog (*Rana draytonii*)
- Northwestern pond turtle *(Clemmys (Actinemys) marmorata marmorata*)
- California clapper rail (*Rallus longirostris obsoletus*)
- California black rail (*Laterallus jamaicensis coturniculus*)
- Northern spotted owl (*Strix occidentalis caurina*)
- Salt marsh harvest mouse (*Reithrodontomys raviventris*)

Based on quad searches and special status species listings from federal and state agencies searches, 33 plant species have been identified as having some potential of occurring within the project sites. Of these, only four species, based on literature and database reviews and familiarity with local flora, are considered likely to occur within the project sites. None are listed as threatened or endangered; all are species of concern.

- Point Reyes bird's-beak (*Cordylanthus maritimus ssp. palustris*)
- Pale Yellow/Hayfield tarplant *(Hemizonia congesta ssp. congesta)*
- Marsh microseris *(Microseris paludosa)*
- Marin knotweed *(Polygonum marinense)*

The RMA program is complex; at any one time during the work season, different work activities may be occurring at several sites, with several different contractors. In all cases, all routine maintenance activities shall be conducted in such a way as to avoid and/or minimize environmental impacts to special status species, sensitive habitats, and water quality. Pre-construction surveys to locate special status species will be conducted before maintenance activities commence as prescribed and work at each site will be scheduled around relevant work windows where possible to avoid impacts (Table 1; page 7). Work at a site may be re-scheduled based on survey finding if necessary. A suite of General and Activity-Specific Conditions apply to activities implemented as part of the RMA program as well as species-specific Avoidance and Minimization Measures (AMMs).

Best Management Practices (BMPs) have been prescribed for each project site, depending on activity type, site constraints, and species presumed to be present. BMPs to be implemented at each site are referenced from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and FEMA.

General and Activity-Specific Conditions, AMMs and BMPs are incorporated into the RMA project description and included in the individual Project Fact Sheets for each site. The job of the Environmental Compliance Coordinator is to ensure that all measures are employed as prescribed in the field prior to, during and after implementation. The General and Activity-Specific Conditions, AMMs and species-specific AMMs are described in detail below and included in the Project Fact Sheets developed for each site.

MITIGATIONS

The following mitigation measures are proposed to avoid and minimize the reduction in the number of endangered, threatened or rare species, or substantial alteration of their habitats and would decrease the risk of impacts to a level of less than significant.

GENERAL CONDITIONS

V.7(a)-1. Designation of Environmental Compliance Coordinator- An Environmental Compliance Coordinator (ECC) shall be designated by the County of Marin Flood Control District. The ECC shall have an understanding of biological resources, missions of regulatory agencies, regulations as they may affect listed species, and the nature of the maintenance activities. In the planning stage, before commencement of a maintenance activity, the ECC shall review project specific information on the type, location, and extent of the activity and associated areas of disturbance. S/he shall determine appropriate pre-construction surveys that may be required, depending on the species involved and the type of activity planned for that project site. The ECC shall ensure that the project crews adhere to General and Activity-Specific Conditions and Avoidance and Minimization Measures prescribed for each site and type of activity.

V.7(a)-2. Assessment, Buffers, and Stop Work Orders- The ECC shall assess field conditions at the start of each work day. If any special status species or nesting birds are observed, the ECC shall coordinate with the contractor foreman to either establish buffers areas, if sufficient, or to stop any activity the ECC deems may result in take or destruction of habitat. Stopped work shall not be allowed to resume until appropriate corrective measures have been completed or it has been determined that nesting is complete. The ECC shall immediately report any unauthorized impacts to the appropriate trustee agency (i.e. USACE, USFWS, NMFS, and/or CDFG).

V.7(a)-3. Contractor Crew Training- The ECC shall ensure that before work starts, all on-site maintenance activity personnel and contractors receive instruction regarding the presence and description of listed species at each project site and the details of appropriate avoidance and minimization measures.

V.7(a)-4. Site Preparation/Wildlife Reconnaissance - The ECC shall walk the site each day before maintenance activities commence to locate wildlife; if any special status wildlife species are noted, work shall not commence until all individuals have left the work site on their own and/or it has been determined that they are not nesting within the project site.

V.7(a)-5. Monitoring and Reporting Program- The ECC shall implement a monitoring and reporting program that shall include, but not be limited to: preparing each year's project list, scheduling pre-construction surveys, overseeing project activity during maintenance, preparing photo documentation, and evaluating post-maintenance restoration/revegetation, if necessary. Reporting regarding project impacts to California red-legged frogs shall be performed in accordance with the terms and conditions issued by the USFWS. Report of sightings will be documented using the CNDDB protocols published by the Department of Fish and Game. .

V.7(a)-6. Work Windows - To avoid impacts to special status species, the maintenance activities carried out shall typically occur during the summer low flow season. The general work window for RMA activities is from April 15th to October 15th, depending on weather. As a rule, work at each site will be scheduled around relevant work windows to avoid impacts. In instances where work needs to be scheduled outside of an established work window for a particular species in a specific location, species-specific pre-construction surveys will be conducted before maintenance activities commence. Work at a site may be re-scheduled based on survey findings, and/or may require application of Avoidance and Minimization Measures before proceeding. In all cases, all routine maintenance activities shall be conducted in such a way as to avoid and/or minimize environmental impacts to special status species, sensitive habitats, and water quality. The work window for streamside restoration by the STRAW Program is from October-March when schools are in session.

SPECIES SPECIFIC AVOIDANCE AND MINIMIZATION MEASURES (AMMs)

Avoidance and Minimization Measures for Fish

FISH-1: Salmonids

Several project sites within the RMA watersheds have the potential for presence of steelhead trout. If steelhead are known to be absent from the project site based on CEMAR/DFG surveys or there are long-standing natural or artificial downstream barriers sufficient to prevent upstream migration, then avoidance has been accomplished and no further actions are necessary. Presence or absence of steelhead trout in each project area is documented in the project fact sheets which are used on a daily basis by the Environmental Compliance Coordinator to guide the implementation of AMMs and BMPs in the field before, during and after completion of maintenance activities.

If steelhead trout are determined or presumed to be present at the project site, then the following Avoidance and Minimization Measures shall be implemented; therefore project impacts will be mitigated to a less-than-significant level:

V.7(a)-7. Work Window: All work in and around salmonid streams is restricted to the period of June 15th to October 15th in any given year. This is to take advantage of low stream flow and avoid the spawning and egg/alevin incubation period which occurs in the late fall and the outmigration period in the spring. Work outside of the channel is not subject to this modified work period.

V.7(a)-8. No equipment is to be operated from within the active stream channel unless the stream has been dewatered and fish have been relocated by a qualified biologist.

V.7(a)-9. To minimize turbidity and stress to salmonid species, personnel shall avoid walking through stream pools and thalwegs, and shall instead walk across riffles or outside of the stream bed to access a project site.

V.7(a)-10. To minimize disturbance during sediment removal activities, if there is flow or seepage in a work site, a reach of creek may have to be de-watered. Before construction of the de-watering system, a qualified biologist shall conduct fish relocation activities, and immediately release captured fish to a suitable habitat near the project site.

V.7(a)-11. Screens shall be placed on all pumps used for dewatering the work site in accordance with NOAA Fisheries' Fish Screening Criteria for Anadromous Salmonids (NMFS, 1997).

V.7(a)-12. If used, coffer dams shall be constructed upstream of the work site within the stream banks, and shall be constructed with clean river gravel or sand bags and covered with sheet plastic. Intakes and outlets shall be designed to minimize turbidity and the potential to wash contaminants into streams.

V.7(a)-13. Pump discharge must be directed into a settling basin to allow silt removal. Once the project work is complete, water shall be slowly released back into the creek to prevent erosion and limit turbidity.

V.7(a)-14. All habitat improvements on salmon and steelhead streams shall be done in accordance with techniques in the California Salmonid Stream Habitat Restoration Manual (CDFG 2010d).

Avoidance and Minimization Measures for Reptiles

REP-1: Northwestern pond turtle

Several sites may contain suitable habitat for northwestern pond turtle, and they have been known to occur at sites 1-ASJ-1, 1-LYC, and 1-WAR-2.

V.7(a)-15. Work window: There is no work windows for this species; surveys may be required if maintenance activities will occur in potential pond turtle habitat. Prior to and during maintenance work, the following Avoidance and Minimization Measures shall be implemented; therefore project impacts will be mitigated to a less-than-significant level:

V.7(a)-16. Pre-construction surveys for northwestern pond turtles shall be conducted at these sites by a qualified biologist in accordance with USFWS protocols within 72 hours of the start of maintenance. The creek shall be surveyed for presence of turtles and the creek banks surveyed for presence of burrows; all locations of observed turtles and burrows shall be noted.

V.7(a)-17. Each day, before maintenance activities begin, the Environmental Compliance Coordinator (EEC) shall make a quick survey for turtles, paying close attention to areas where turtles or burrows had been noted during the pre-construction survey. If turtles are observed, the ECC shall assess the likelihood of project impacts to these species and coordinate findings with the USFWS and CDFG to ensure that appropriate protective measures are applied including hand removal or installation of fencing to avoid the area completely. At any time during maintenance activities, if a northwestern pond turtle is observed by the ECC, maintenance crew, or other knowledgeable persons, maintenance activities shall stop and the appropriate protective measures shall be applied including hand removal or installation of fencing to avoid the area completely.

V.7(a)-18. All staging areas for all heavy equipment, storage of materials, and any maintenance/fueling of heavy equipment shall be clearly identified in order to minimize impacts to upland habitats outside the project site.

V.7(a)-19. Training sessions shall be given to all workers to inform them of protective measures, instruct them in identification of northwestern pond turtles, their upland and aquatic habitat requirements, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

Avoidance and Minimization Measures for Birds

Following are avoidance and minimization measures for birds. Some of these relate directly to listed species with the potential to occur within one or more of the project sites (the rails, northern spotted owl); however, others relate more generally to a class of species, such as raptors and wading birds and land birds.

V.7(a)-20. Work window: At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start after July 31st potential impacts will be avoided and no surveys will be required. Because the culverts in the proposed project sites are fairly small, there is minimal likelihood that they would provide suitable habitat for swallows. However, if any culverts show evidence of past or current swallow nesting, the ECC shall identify them and maintenance activities shall occur after August 31 or after all swallows have fledged to avoid impacts.

V.7(a)-21. If work in the riparian zone will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will

not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until the young have left the nest and will no longer be impacted by the project.

BIRD-1: California Clapper Rail and California Black Rail

Several of the sites are within or immediately adjacent to suitable habitat for California clapper rail and California black rails (15-20 sites). The following avoidance and minimization measures apply to all sites within 250 feet of salt or brackish tidal marshland, which will also help to protect other marshland dependent species such as saltmarsh common yellowthroat and San Pablo song sparrow.

V.7(a)-22. Work window: The work window for maintenance activities within rail habitat is the non-nesting season of September 1st through January 31st. If maintenance activities are scheduled to ocur within the nesting season (February 1st to August 31st) , the following Avoidance and Minimization Measures shall be implemented; therefore project impacts will be mitigated to a less-than-significant level:

V.7(a)-23. Work shall be scheduled to avoid periods of high tides, as the high water reduces the amount of refugial habitat for the rails.

V.7(a)-24. If maintenance activities are scheduled during the nesting season (February 1st to August 31st , a qualified biologist, in coordination with USFWS and/or CDFG, shall conduct a pre-construction survey within 5 days of the start of maintenance activities to check for nests and presence of the rails within the project sites. Additional surveys may be required including visual and/or call surveys to determine presence. A buffer zone of 250 feet from nests or occupied rail habitat shall be established and any activity within that buffer zone that has potential to disturb rails (i.e. high-decibel construction, pumping, use of heavy machinery, etc.) shall be rescheduled for later in the season once nesting has ended and the young have fledged (from September 1st through January 31st). If no nests are found but rails are present, the birds must be allowed to leave the area on their own before work can commence.

V.7(a)-25. When working within 250 feet of salt or brackish marshland, presence for either rail species shall be assumed; therefore, maintenance work in these areas shall be scheduled between September 1st and January 31st in any given year.

V.7(a)-26. Removal or disturbance of emergent tidal marsh vegetation shall be avoided, and removal or disturbance of vegetation at the tidal marsh/upland interface shall be avoided to provide a buffer of refugial habitat within as wide a swath as possible (3 meter minimum) from the Mean Higher High Water (MHHW) line. If maintenance or dredging activity does intrude into tidal marsh habitat, a qualified biologist shall survey the area prior to beginning work in order to determine the presence/absence of rails.

BIRD-2: Northern Spotted Owl

Per Department of Fish and Game Protocol for Surveying Proposed Management Activities that May Affect Northern Spotted Owls (2010), project sites are defined as the project footprint plus a .25 mi. radius buffer around it. Centers of northern spotted owl activity are located on Old Mill Creek, Cascade Creek, Warner Canyon Creek, Bothin Creek, Larkspur Creek, and Ross Creek and several of these documented locations fall within the .25 mi. buffer around several of the work sites: (3-OMC; 3-CAS; 3-WAR; 9-BOTH; 9-LAR-2; and 9-ROS).

V.7(a)-27. Work window: To avoid impacts to breeding northern spotted owls, maintenance activities identified as having potential impact on northern spotted owls or their habitat shall follow a limited operating period (LOP) with no work scheduled during the breeding season of February 1st through July 15th. If a biological evaluation conducted by a qualified biologist determines that vegetation projects are unlikely to result in breeding disturbance considering their intensity, duration, timing and specific location, or where a biological evaluation determines that topographic features may shield nest sites, the LOP may be waived or the buffer distance modified.

BIRD-3: Raptors and wading birds

Several of the sites are adjacent to suitable habitat for raptors and wading birds. Although none of these species are listed, they are protected by the Migratory Bird Act, and impacts to them shall be minimized.

V.7(a)-28. Work window: At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start outside of the nesting season (July 31 – January 31), then avoidance has been achieved and work can proceed. If maintenance activities are scheduled outside of the work window during the nesting season (Feb 1st- July 31st) then the following AMMs shall be followed:

V.7(a)-29. The ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until young have left the nest and will no longer be impacted by the project.

V.7(a)-30. During nesting season, (February 1st - September 1st), the ECC shall walk the area of proposed activity each day before maintenance activities begin to determine presence of nesting raptors and wading birds. If none are observed, avoidance can be assumed and work can proceed.

V.7(a)-31. At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start after July 31st potential impacts will be avoided and no surveys will be required. However, if work in the riparian zone will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until young have left the nest and will no longer be impacted by the project.

BIRD-4: Landbirds

Many of the project sites are along riparian corridors that potentially support many passerine and non-passerine birds, some of which are seasonal and some of which are year-round residents. These project sites include: 1-NOV-3, 3-ACMP-3, 3-NYH-2, 5-EAS-2, 9-CMC-4, and many more. Any removal of trees or shrubs, or maintenance activities in the vicinity of active bird nests, could result in nest abandonment, nest failure, or premature fledging. Destruction or disturbance of active nests would violate the federal Migratory Bird Treaty Act (MBTA) and California Department of Fish and Game (CDFG) Code.

V.7(a)-32. Work window: Avoidance will be achieved if maintenance activities are scheduled between August 1st to January 31st to avoid the nesting season (February 1st - July 31st). If maintenance activities are scheduled outside of the work window, then the following Avoidance and Minimization Measures shall be implemented:

V.7(a)-33. The removal of any trees or shrubs shall occur after August 1st, once the nesting season is complete. If removal of trees or shrubs occurs between February 1st and July 31st, a nesting bird survey shall be performed by a qualified biologist within 14 days prior to the removal or disturbance of potential nesting trees or shrubs. All trees with active nests shall be flagged and a non-disturbance buffer zone shall be established around the nesting tree, or the site shall be avoided until it has been determined that the young have fledged. Buffer zones typically range between 50-90 ft for passerines and non-passerine land birds. Active nests shall be monitored by a qualified biologist to determine when the young have fledged and are feeding on their own before work is allowed to begin.

V.7(a)-34. In addition to surveying trees and shrubs for nesting birds, surveys shall be conducted for ground nesting birds by walking narrow transects through the grassland adjacent to the project site within 14 days prior to the commencement of project related activities by a qualified biologist.

V.7(a)-35. The ECC shall be present at the commencement of maintenance-related activities to ensure that nesting birds and sensitive bird species have not inhabited the project site during the window following pre-construction surveys and commencement of maintenance activities. The ECC shall also survey all staging areas to ensure nesting and special status birds are not present.

V.7(a)-36. Training sessions shall be given to all workers to inform them of protective measures, instruct them in identification of sensitive habitat and bird species, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

Avoidance and Minimization Measures for Mammals

MAMM-1: Salt Marsh Harvest Mouse (SMHM)

Salt marsh harvest mouse is a federal and state listed endangered species although critical habitat has not been designated for this species. This species is found in saline emergent marsh vegetation with dense pickleweed. It is reported to occur within the project site in lower reaches of Novato Creek levees, Gallinas Creek South Fork, and Bothin Marsh sites. Approximately 15-20 sites are adjacent to suitable habitat for salt marsh harvest mouse; and about half of those sites include work where removal of pickleweed may impact salt marsh harvest mouse habitat. For these sites, the following AMMS should be followed:

V.7(a)-37. Work window: There are no seasonal work windows for this species since they breed year around,

V.7(a)-38 Work shall be scheduled to avoid periods of high tides, as the high water reduces the amount of refugial habitat for SMHM. Generally, work should not be scheduled to occur between two hours before high tide and two hours after high tide.

V.7(a)-39. If maintenance activities are conducted in potential SMHM habitat, a qualified biologist shall conduct a pre-construction survey within 5 days of the start of maintenance activities to determine the presence/absence of SMHM within and adjacent to the work area. Surveys shall follow USFWS protocols. In addition, a biological monitor shall be present during maintenance-related activities within or adjacent to all suitable nesting habitat areas to ensure that salt marsh harvest mice are not present during operations.

V.7(a)-40. For sites where work includes removal of pickleweed, under the supervision of a qualified biologist and according to protocols established by Zedler (2001), vegetation shall be removed only with non-mechanized

hand tools; no motorized equipment shall be used. Vegetation removal may begin only when no mice are observed, and shall start at the edge farthest from the salt marsh and work its way towards the salt marsh. If a mouse of any species is observed within an area where pickleweed is being removed, work shall stop and DFG shall be notified. Unless otherwise approved by DFG, the mouse shall be allowed to leave on its own volition.

V.7(a)-41. If trenching takes place within 50 ft of pickleweed areas, exclusionary fencing shall be installed around worksites before excavation begins, according to DFG specifications on size and placement of fencing. An escape ramp shall be placed in any open trench at the end of the day to allow any entrapped animals to escape.

V.7(a)-42. When implementing maintenance activities in upland areas adjacent to salt or brackish marshland, vehicles shall be confined to existing roads where possible, Crews shall use matting, pontoon boards or other comparable methods whenever feasible to minimize impacts to the existing vegetation. The placement of mats shall be verified by a qualified biologist before their placement to minimize habitat impacts. Crews shall work exclusively from mat boards and boardwalks to minimize trampling of vegetation.

V.7(a)-43. A biological monitor shall be on-site during all work activities within potential SMHM habitat, and will have the authority to halt project activities in order to comply with these terms. Training sessions shall be given to all workers to inform them of protective measures, instruct them in identification of the SMHM and its habitat requirements, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

MAMM-2: Roosting Bats

V.7(a)-44. Work window: The work window for activities at sites where bats are determined to be present is from September 1st through January 31st. Impacts can be avoided by scheduling work, especially removal of trees and/or dense growths of ivy, after the breeding season ends on September 1st of any given year.

V.7(a)-45. Some of the sites may be within or adjacent to suitable habitat for roosting bats. If work is conducted outside of the work window, pre-construction surveys for signs of roosting bats shall be conducted concurrent with those for land birds. If surveys occur during the daytime, the biologist shall look for presence of bat droppings at likely roost sites (under bridges and trees (in layers of bark, woodpecker holes, and hollow branches). The droppings are black and small, about 4 – 8 mm long. Bat droppings crumble into powder when crushed, as they consist of insect remains (in contrast, mouse droppings are sticky when fresh and hard when old). During evening hours bats may be confirmed visually at dusk although species identification cannot be ascertained without the use of sonar recordings and specialized software. If no signs of bats are detected during the pre-construction surveys, avoidance has been achieved and maintenance activities can proceed.

V.7(a)-46. If bat guano was detected during the pre-construction survey, and removal of trees, shrubs, or dense ivy is scheduled to occur before September 1st, a qualified biologist shall conduct a roosting bat survey within 30 days prior to the removal or disturbance of potential nesting/roosting trees or shrubs. If bats are detected, work shall be re-scheduled for after the breeding season.

Avoidance and Minimization Measures for Plants

PLANT-1: Special Status Plants

Special-status plant species include those listed as Endangered, Threatened, Rare or those species proposed for listing by the USFWS (2001b), the CDFG (2010a,b) and the CNPS (2010). The CNPS listing is sanctioned by the

CDFG and serves essentially as their list of "candidate" plant species. CNPS List 1B and List 2 species are considered eligible for state listing as endangered or threatened under the CDFG Code. Such species should be fully considered during preparation of environmental documents subject to the California Environmental Quality Act (CEQA). CNPS List 3 and List 4 species are considered to be either plants about which more information is needed or are uncommon enough that their status should be regularly monitored. Such plants may be eligible or may become eligible for state listing, and CNPS and CDFG recommend that these species be evaluated for consideration during the preparation of CEQA documents.

Based on quad searches and special status species listings from federal and state agencies searches, 33 plant species have been identified as having some potential of occurring within the project sites (Appendix A). Of these, only four species, based on literature and database reviews and familiarity with local flora, are considered likely to occur within the project sites. None are listed; all are species of concern. Based on a reconnaissance-level survey and habitat assessment, many of the 33 species with at least some potential to occur within the region can be ruled out from the work sites due to the lack of suitable habitat within the project corridor. Specialized habitats such as playas, coastal dunes, lower montane coniferous forest, vernal pools, coastal bluff scrub, coastal prairie, and serpentine-derived soils or outcrops are not present within the study area or work sites.

Although location data for several special-status plant species places them within the study corridor, the presence of some of these within the work sites remains highly unlikely. In many cases, the location data from CNDDB represent historic data from the time period before large-scale development. In other cases, the CNDDB data represent best guesses as to location, and while shown as covering the proposed project sites, the required habitat may not be present within the work sites.

The following four plant species are considered to have some potential to occur within one or more of the work sites, due to: 1) the presence of suitable habitat, 2) the plant was detected during the site reconnaissance, and/or 3) the species has been reported within the vicinity of the work sites.

1. ***Point Reyes bird's-beak (Cordylanthus maritimus ssp. Palustris;*** *STATUS. Point Reyes bird's beak is a federal species of special concern and is listed by the CNPS as 1B. PROJECT SITE OCCURRENCE The CNDDB lists 42 occurrences of Point Reyes bird's beak in Marin County; the majority of these are on the western coast. Sites near CNDDB occurrences include: 3-BM, 3-MIL-3, 3-RYC-1, 3-SUT-1.*

2. ***Pale Yellow/Hayfield tarplant*** (Hemizonia congesta ssp. congesta) *STATUS. The pale yellow tarplant is not listed by the federal or state governments but is listed by the CNPS as 1B. PROJECT SITE OCCURRENCE. The CNDDB lists a record in Ignacio near sites 1-ASJ-1, 1-ASJ-2, and 1-ASJ-3.*

3. ***Marsh microseris (Microseris paludosa)*** *STATUS. The marsh microseris is not listed by the federal or state governments but is listed by the CNPS as 1B. PROJECT SITE OCCURRENCE. The CNDDB lists occurrences in the vicinity of sites: 3-CAS, 3-ACMP-3, and 9-LAR-2.*

4. Marin knotweed (*Polygonum marinense*) *STATUS. Marin knotweed is a federal species of special concern and is listed by the CNPS as 3 (needing taxonomic review). PROJECT SITE OCCURRENCE. The CNDDB contains record for Marin knotweed on Corte Madera Creek, just downstream of site 9-CMC-1 and at the creek mouth.*

The following mitigations developed for treatment of special status plants and their habitats shall be adhered to during project implementation; therefore impacts to these species will be less-than-significant:

V.7(a)-47. Work window: There are no work windows for the plant special status species; surveys may be required if species may be impacted.

V.7(a)-48. At sites where vegetation may be modified (such as mowing, clearing, or ground-breaking), and where special status plant species may potentially occur, a qualified biologist should conduct a habitat assessment during blooming periods to determine the presence of suitable habitat. If no potentially suitable habitat is identified during the habitat assessment, then avoidance has been accomplished and no further actions are necessary.

V.7(a)-49. If suitable habitat is determined to be present within the maintenance site, botanical surveys should be conducted before activities commence to determine whether any special status plant species are present. Rare plant surveys, if necessary, should be conducted following the Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities (CDFG 2009b) and Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed and Candidate Plants (U.S. Fish and Wildlife Service 2000). Surveys should be conducted in the field when species are both evident and identifiable, normally during flowering or fruiting. Multiple visits to a site may be necessary to capture the floristic diversity present at the site.

V.7(a)-50. If listed species are observed or presumed present, then the ECC should take such action as is necessary to protect the plants, using fencing, buffers, etc. If possible and practicable, the project should be redesigned to avoid listed plant species.

V.7(a)-51. For all observed special status species, the ECC should complete and submit a California Native Species (or Community) Field Survey Form to the CNDDB documenting the species and location. The ECC shall ensure that the Project Foreman is aware of these site-specific conditions, and shall inspect the work site before, during, and after completion of the maintenance activities.

MITIGATION MONITORING MEASURES

V.7 (a)-1-51. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

b)	**Substantial change in the diversity, number, or habitat of any species of plants or animals currently present or likely to occur at any time throughout the year? (source #(s): 3, 4)**	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

The ECC shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed.
As a precaution against invasive quagga and zebra mussels, if kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary.

All construction activities for the project would be completed in a fashion that minimizes disturbance to existing riparian and aquatic habitat. The proposed removal of riparian vegetation is the absolute minimum necessary to provide access for maintenance equipment, restore the natural flow regime, provide flood protection, and minimize loss of riparian trees. Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program.

Avoidance and minimization measures prescribed for each activity at each site have been established and shall be implemented to ensure that animals inhabiting the project area. The following mitigation measures are proposed to avoid and minimize changes in the diversity, number, or habitat of any species of plants or animals currently present or likely to occur on the project site and would decrease the risk of impacts to a level of less than significant.

MITIGATION MEASURES

V.7(b)-1. DPW shall minimize any riparian tree removal in order to preserve habitat quality. Removal of native riparian vegetation shall be limited to that necessary for equipment access and flood control (e.g., removing fallen trees in channels).

V.7 (b)-2. An Environmental Compliance Coordinator (ECC) shall be designated for all maintenance activities. The ECC shall have an understanding of biological resources, missions of regulatory agencies and regulations as they may affect listed species, and the nature of the maintenance activities. Before commencement of a maintenance activity, the ECC shall review the individual project fact sheets containing project specific information on the type, location, and extent of the activity and associated areas of disturbance. S/he shall determine appropriate measures to implement, based on the type of activity, and shall prescribe appropriate avoidance and minimization measures and general and activity-specific conditions and prohibitions.

V. 7 (b)-3. All prescribed General Conditions and Avoidance and Minimization Measures, as described above and documented in the Project Fact Sheets for each project site, shall be adhered to during pre-project planning, implementation and post-project clean-up.

V. 7 (b)-4. The ECC shall ensure that the Project Foreman is aware of any site-specific conditions and avoidance and minimization measure prescribed for the activity at each site, and shall inspect the work site before, during, and after completion of the maintenance activities.

MITIGATION MONITORING MEASURES

V.7(b)-1. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

c)	**Introduction of new species of plants or animals into an area, or improvements or alterations that would result in a barrier to the migration, dispersal or movement of animals? (source #(s):** 3, 4)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

The ECC shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed. As a precaution against invasive quagga and zebra mussels, if kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary. Exotic plants are often introduced by seed banks contained in imported fill or mud that is caked onto construction equipment that moves from site to site. The District shall not bring any fill to project sites. Invasive plants can also be introduced by seeds contained in hydro-seed mixes or hay products. Therefore, sediment and erosion control measures shall avoid using these products and use only weed-free rice straw or other similar products for erosion control.

Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program.

The ability of wildlife to move through the landscape is important for migration (seasonal breeding and feeding), dispersal (new home ranges and long-term genetic exchange), and for daily movement within individual territories. Habitat fragmentation creates a greater number of habitat patches that are smaller in size than the original contiguous habitat. This, in turn, can hinder regional wildlife movements, put stress on local populations, and increase the probability of extinction for these populations compared to those associated with non-fragmented landscapes. Considering the impacts resulting in potential fragmentation of primary habitat types and loss of valuable dispersal corridors is important when assessing the biological impacts of a project. Because the activities proposed do not involve the permanent loss of wetland and/or riparian habitat within the work sites, they are not likely to affect wildlife movement corridors or contribute to habitat fragmentation. Given that the proposed work is maintenance-related, the project will likely only result in short-term temporal impacts (1-2 days) to movement for aquatic species dependent the subject habitats. Movement through these areas will be restored as soon as maintenance activities are completed.

Removal of excessive sediment should help to open the channel and enhance opportunities for resident and migratory fish and other aquatic species to move freely to suitable upstream and downstream habitats. Re-colonization of on-site native wetland vegetation communities to their previous condition will occur naturally. Implementation of the following mitigation measures would decrease the risk of impacts caused by the accidental introduction of new species of plants or animals into the project area to a level of less than significant.

MITIGATION MEASURES

V.7(c)-1. The District shall prevent the unintentional introduction of new species of plants or animals into the project area by a wash down of all equipment prior to transporting it to project sites in order to eliminate mud that may harbor exotic plant species and animals.

V.7(c)-2. The District shall not import fill to project sites.

V.7(c)-3. The District shall only use straw wattles that contain weed-free rice straw and shall not use hydro-seeding or seeded hay products.

V.7(c)-4. If kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary.

MITIGATION MONITORING MEASURES

V.7(c)-1-4. District staff shall verify that these Mitigation Measures have been properly implemented.

8. ENERGY AND NATURAL RESOURCES. *Would the proposal result in:*

a) **Substantial increase in demand for existing energy sources, or conflict with adopted policies or standards for energy use? (source #(s): 1)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Due to the maintenance nature of the project, no increase in demand for existing energy sources or standards for energy use will be affected. Therefore, this is a less-than-significant impact.

b) **Use of non-renewable resources in a wasteful and inefficient manner? (source #(s): 1)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and implementation will require very little use of non-renewable natural resources, however some fuel will be spent on equipment usage, although the impact of this usage would create a less-than-significant impact.

c) **Loss of significant mineral resource sites designated in the Countywide Plan from premature development or other land uses which are incompatible with mineral extraction? (source #(s): 1)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No significant mineral resources are found on the project site, therefore, this is a less-than-significant impact.

9. HAZARDS. *Would the proposal involve:*

a) **A risk of accidental explosion or release of hazardous substances including, but not necessarily limited to: 1) oil, pesticides; 2) chemicals; or 3) radiation)? (source #(s): 1, 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Best Management Practices, including those covering Chemical Use shall be employed to prevent or reduce the risk from, or impacts from, the accidental discharge of chemicals from vehicles operating at the project sites. Therefore, this is a less-than-significant impact.

b) **Possible interference with an emergency response plan or emergency evacuation plan? (source #(s):** 3, 4).	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The sediment removal activities shall not interfere with an emergency response or evacuation plan. In the case of an emergency, all heavy equipment shall immediately be removed from the roadway in order to allow vehicles to enter the area. Heavy equipment deployed at the project site can be removed in a matter of a few minutes during an emergency or evacuation. Therefore, this is a less-than-significant impact.

c) **The creation of any health hazard or potential health hazard? (source #(s):** 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The implementation of routine maintenance activities will not create any potential health hazards; therefore, this is a less-than-significant impact.

d) **Exposure of people to existing sources of potential health hazards? (source #(s):** 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The removal of sediment from the creeks and channels and replanting streamsides with native vegetation will not expose people to existing sources of health hazards; therefore, this is a less-than-significant impact.

e) **Increased fire hazard in areas with flammable brush, grass, or trees? (source #(s):** 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

One of the primary goals of vegetation management is to reduce fire fuels lading and the potential for fire hazards. Fire fuel reduction is achieved by mowing on tops of banks and levees, removal of fallen trees, removal of standing dead trees, and thinning and removal of non-native species such as ivy and Himalayan blackberry. For mowing, crews use weed-eaters for smaller areas and tractors with mowing attachments for larger, more open areas. Therefore the proposed project will have a positive effect on reducing fire hazards, therefore this is a less-than-significant impact.

10. NOISE. ***Would the proposal result in*:**

a) **Substantial increases in existing ambient noise levels?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

There will be a temporary increase in ambient noise levels during normal working hours if heavy equipment (e.g. backhoe or excavator) is used to remove sediment from the creeks, channels and drainage ditches. The duration of the impacts will be short, typically a few days, depending on the site, and the noise level will be comparable to noise generated during typical routine maintenance activities conducted by public works or flood control districts. The noise impact be limited to typical day time construction hours between 7 a.m. and 5 p.m., therefore, this is a less-than-significant impact.

b) **Exposure of people to significant noise levels, or conflicts with adopted noise policies or standards?** (source #(s): 1, 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

There will be an increase of noise levels during implementation of maintenance activities but only for a temporary time as with any maintenance project. Any increase in noise levels from construction equipment on private property will occur where landowners have given prior permission for maintenance activities to occur. The increase in maintenance related noise levels would only occur during weekdays, from approximately 8:00 a.m. to 4:00 p.m. This is consistent with the County's adopted noise policy from 7am-6pm, Mon.-Fri. and not on holidays. Therefore, this is a less-than-significant impact.

11. **PUBLIC SERVICES.** ***Would the proposal have an effect upon, or result in a need for new or altered government service in any of the following areas:***

a) **Fire protection?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The fire fuels reduction aspect of the project is designed to reduce the risk of fire along grassy levees and upper stream banks. Mowing is scheduled to be completed before the Fourth of July holiday as an added measure to prevent fires related to holiday fireworks. The project does not include a demand for additional fire protection services; therefore, this is a less-than-significant impact.

b) **Police protection?** (source #(s) 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The sediment removal maintenance project will not have an effect on police protection; therefore, this is a less-than-significant impact.

c) **Schools?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

Project implementation will not result in dangerous design features or incompatible uses with schools; therefore this be a less than significant impact.

d) **Maintenance of public facilities, including roads?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

A primary goal of the proposed RMA program is to perform maintenance operations on County flood control channels and related infrastructure, including levees, tide gates, pump stations and trash racks. The objective of maintaining this infrastructure is to reduce the risk of potential flooding and consequential adverse impacts on other infrastructure including adjacent buildings and roads. The project itself will provide additional government services to protect people and infrastructure from flooding and will benefit the maintenance of public facilities; therefore this is a less-than-significant impact.

e) **Other governmental services?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The RMA program does not create an increased demand for additional services but rather the project will increase governmental services by providing greater flood control protection through routine maintenance of flood control channels and related infrastructure, including levees, tide gates, pump stations and trash racks. Regular routine maintenance of facilities will reduce the risk of potential flooding and consequential adverse impacts on other infrastructure including adjacent buildings and roads. This in turn will decrease the need for emergency government services during high storm flows; therefore, this is a less-than-significant impact.

12. **UTILITIES AND SERVICE SYSTEMS.** ***Would the proposal result in a need for new systems, or substantial alterations to the following utilities:***

a) **Power or natural gas?** (source # (s): 1, 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

No alterations to power or natural gas will be required for the maintenance project; therefore, this is a less-than-significant impact.

b) **Communications systems?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to communications systems will be required by the maintenance project; therefore, this is a less-than-significant impact.

c) **Local or regional water treatment or distribution facilities?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to water treatment or distribution will be required by the maintenance project; therefore, this is a less-than-significant impact.

d) **Sewer or septic tanks?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to sewer or septic tanks will be required by the maintenance project, therefore, this is a less-than-significant impact.

e) **Storm water drainage?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The flood control routine maintenance activities proposed in this project will have a positive affect on the function of flood control channels and streams to carry and conduct stormwater run-off. Limited removal of obstructing vegetation and excavation of sediment deposits will increase channel function and decrease the potential risk of flooding. The regular maintenance of tide gates and trash racks will increase the ability of storm flows to travel through stream channels. The project's objective is to maintain channel function, especially during peak storm events; therefore, this is a less-than-significant impact.

f) **Solid waste disposal?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to solid waste disposal will be required by the maintenance project; therefore, this is a less-than-significant impact.

13. AESTHETICS/VISUAL RESOURCES. ***Would the proposal:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Substantially reduce, obstruct, or degrade a scenic vista open to the public or scenic highway, or conflict with adopted aesthetic or visual policies or standards? (source # (s): 1, 3)	[ ]	[ ]	[X]	[ ]

No alterations to scenic vistas will result from the maintenance project. The project would minimize potential impacts to sensitive habitats at the project sites and would be designed to blend into the surrounding natural environment to the greatest extent feasible. Some trimming of riparian trees will occur, but the project would not change the riparian character of the project sites. The projects would not obstruct or alter the visual character of the project sites or result in visual impacts to public or scenic views and vistas from adjacent roadways. Because this is a flood control maintenance project that does not result in any permanent structures and is temporary in nature, project activities would not adversely affect views, light or privacy of private properties. Therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Have a demonstrable negative aesthetic effect by causing a substantial alteration of the existing visual resources including, but not necessarily limited to: 1) an abrupt transition in land use; 2) disharmony with adjacent uses because of height, bulk or massing of structures; or 3) cast of a substantial amount of light, glare, or shadow? **(source #(s): 1, 3)**	[ ]	[ ]	[X]	[ ]

No alterations to visual resources will result from the project. The project would minimize potential impacts to sensitive habitats at the project site and would be designed to blend into the surrounding natural environment to the greatest extent feasible. Some removal and trimming of riparian trees will occur, but the project would not change the riparian character of the sites. The projects would not obstruct or alter the visual character of the sites or result in visual impacts to public or scenic views and vistas from adjacent roadways. Because this is a flood control maintenance program that does not result in any permanent structures, project activities would not adversely affect views, light or privacy of private properties. Therefore, this is a less-than-significant impact.

14. CULTURAL RESOURCES. *Would the proposal*:

a) **Disturb paleontological, archaeological, or historical sites, objects, or structures? (source #(s): 1, 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[X]	[ ]	[ ]

The proposed project will disturb only aggraded sediment that has been carried from the upper watershed down through the stream and channel system, and many sites where sediment is to be removed have previously been dredged multiple times in the same locations. No historic structures will be impacted by the proposed routine maintenance project since no work is planned to be completed on any structures other than maintenance facilities including weirs, gates, tidegates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, utility line crossings, culverts, outfalls, stormdrain or pump station inlet/outlet structures and similar structures. Although no human remains or archaeological resources are known to occur within the proposed project sites or in the immediate vicinity, it is possible that there may be undiscovered archaeological resources buried at the sites due to their location in a high sensitive area. Such resources could be discovered during proposed sediment removal on the site, making this a potentially significant impact.

The following mitigation measures would reduce potential impacts to less than significant by detailing a course of action in the unlikely event that archaeological resources or human remains are encountered during construction activities.

MITIGATION MEASURES

V.14(a)-1. In the event that any human remains, artifacts, or other indicators of prehistoric or historic use of the parcel are encountered during site preparations or construction activities on any part of the project sites, all work at the vicinity of the discovery site shall be halted immediately. A registered archaeologist, chosen by the County in consultation with the Federated Indians of Graton Rancheria and paid for by the District, shall assess the site and submit a written evaluation recommending appropriate actions to take to protect the site and the resources discovered, including monitoring of all subsequent work at the site by a Native American monitor from the Federated Indians of Graton Rancheria or other designated tribal representative. If human remains are encountered, the County Coroner must also be contacted and State law designates procedures to follow in the event that human remains are encountered. If the remains are deemed to be Native American and prehistoric, the Coroner must contact the Native American Heritage Commission so that a "Most Likely Descendent" can be designated. No work at the site may recommence without approval of the District. If it is determined that a prehistoric site exists, the following shall be implemented:

(a) No future development activity shall take place at or in close proximity to the prehistoric site within the development area;

(b) The historical site(s) shall be filled to protect the resources there;

(c) No additional excavation shall occur at these locations other than to remove surface organic material; and

(d) The District may be required to submit a revised project to protect the resource(s). No further work at the site may recommence without approval of the Department of Public Works Director. All future development of the site must be consistent with findings and recommendations of an archaeological assessment prepared for the site by a registered archaeologist, as approved by the CDA staff.

MITIGATION MONITORING MEASURES

V.14(a)-1. In the event of discovery, DPW staff shall verify that a report has been submitted and all construction work has been stopped. In the event that the report indicates that any human remains, artifacts, or other indicators of prehistoric or historic use of the parcel are encountered during site preparation or construction activities on any part of the project site, DPW staff shall verify that a registered archaeologist has been retained to assess the site and has submitted a written evaluation to DPW advancing appropriate conditions to protect the site and the resources discovered before work commences on the site. If human remains are encountered, DPW staff shall verify that the County Coroner has been contacted and that all future work is carried out in accordance with the mitigation measures.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Have the potential to cause a physical change which would adversely affect unique ethnic cultural values, or religious or sacred uses within the project area? (source #(s): 1, 3)	[ ]	[ ]	[X]	[ ]

No known ethnic, religious or sacred uses are known to exist on or near the project sites. As noted above, the only structures included in the project description are maintenance facilities including weirs, gates, tidegates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, utility line crossings, culverts, outfalls, stormdrain or pump station inlet/outlet structures and similar structures. No other structures are involved. Accordingly, the proposed maintenance project would not have a significant impact on unique ethnic, cultural or religious uses or structures.

15. **SOCIAL AND ECONOMIC EFFECTS.** ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
Any physical changes which can be traced through a chain of cause and effect to social or economic impacts. (source #(s): 1, 3)	[ ]	[ ]	[X]	[ ]

The maintenance project will not result in any known physical changes to social or economic entities. Therefore, this is a less-than-significant impact.

VI. **MANDATORY FINDINGS OF SIGNIFICANCE.** Pursuant to Section 15065 of the State EIR Guidelines, a project shall be found to have a significant effect on the environment if any of the following are true:
(Please explain your answer after each question

		Yes	No	Maybe
a)	Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
b)	Does the project have the potential to achieve short-term, to the disadvantage of long-term, environmental goals? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
c)	Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects). *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project and the entire maintenance program would be mitigated to a level of insignificance. Therefore, this project has no cumulatively considerable effects. See Attachment B for assessment of cumulative impacts and mitigation measures associated with the overall maintenance program at 47 culvert/drainage sites in West Marin.*	[ ]	[X]	[ ]
d)	Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]

VII. PROJECT SPONSER'S INCORPORATION OF MITIGATION MEASURES:

Acting on behalf of the project sponsor or the authorized agent of the project sponsor, I (undersigned) have reviewed the Initial Study for the Marin County Flood Control and Water Conservation District's Routine Maintenance Activities Program (RMA), and have particularly reviewed the mitigation measures and monitoring programs identified herein. I accept the findings of the Initial Study, including the recommended mitigation measures, and hereby agree to modify the proposed project application now on file with Marin County to include and incorporate all mitigation measures and monitoring programs set out in this Initial Study.

FOR

Robert Beaumont; Director

6/4/12
Date

VII. DETERMINATION: Pursuant to Sections 15081 and 15070 of the State Guidelines, the foregoing Initial Study evaluation, and the entire administrative record for the project:

[ ] I find that the proposed project WILL NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.

[X] I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because the mitigation measures described on an attached sheet have been added to the project. A NEGATIVE DECLARATION will be prepared.

[ ] I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.

Signature Rachel Warner Date 2/14/12

Printed Name Rachel Warner Date 2/14/12

RECORD OF PROJECT APPROVAL

CEQA Record of Comments and Responses
Draft Negative Declaration (ND) and Initial Study (IS)

Marin County Flood Control Routine Maintenance Activities

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1) Letter from State of California, Governor's Office of Planning and Research, State Clearinghouse, dated 3-26-12.

Comments: Letter acknowledges that the Clearing House submitted the Initial Study Negative Declaration to the appropriate state agencies for review and they sent copies of comments from the Department of Fish and Game and Cal Trans, which are addressed separately below. State Clearing House acknowledges that Marin County has complied with the review requirements for draft environmental documents, pursuant to the California Environmental Quality Act.

Response: Response to individual agency comment letters below.

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2) Letter from Scott Wilson; California Department of Fish and Game; Bay-Delta Region; dated 3-19-12.

Comment: This Project will impact the bed, bank, channel, and riparian vegetation along numerous streams in the Project area. For any activity that will divert or obstruct the natural flow, or change the bed, channel, or bank (which may include associated riparian resources) of a river or stream, or use material from a streambed, DFG may require a Lake and Streambed Alteration Agreement (LSAA), pursuant to Section 1600 et seq. of the Fish and Game Code, with the applicant. Issuance of an LSAA is subject to the California Environmental Quality Act (CEQA). DFG, as a responsible agency under CEQA, will consider the CEQA document for the Project. The CEQA document should fully identify the potential impacts to the stream or riparian resources and provide adequate avoidance, mitigation, monitoring and reporting commitments for completion of the agreement.

Response: The Marin County Flood Control District acknowledges that a 1600 permit is needed for the project and an application for a five year Routine Maintenance Agreement has been submitted to Tim Dodson of the Department of Fish and Game in Region 3.

Comment: DFG recommends that all mitigation measures within the draft MND include the word "shall" as opposed to "should."

Response: The Program documents have been altered to change the word "should" to "shall" in the General Conditions and Avoidance and Minimization Measures where appropriate.

Comments: The comments listed below are related to work conducted near salt or brackish tidal marshlands and potential impacts to Clapper and Black Rails marshlands.

- On page 43, BIRD-1, DFG recommends that all mitigation measures apply to sites that are within 700 feet of salt or brackish tidal marshland.

- Similarly, Mitigation Measures V.7(a)-24 and 25 should be revised to include a 700-foot buffer.

- DFG recommends that Mitigation Measure V.7(a)-23 be revised to state that no work shall occur near the salt marsh within two hours before or after predicted extreme high tides of 6.5 feet above the National Geodetic Vertical Datum (NGVD), as measured at the Golden Gate Bridge, and adjusted to the timing of local extreme high tide events at the Project site.

- DFG recommends that Mitigation Measure V.7(a)-26 be revised to state that any tidal marsh vegetation removal be conducted outside of the breeding season. All vegetation removal should be conducted by hand. To the extent possible, salt mash vegetation should be salvaged and placed back on-site with intention and care given so that the vegetation may reestablish.

- DFG recommends Mitigation Measure V.7(a)-24 be revised to include the following language to protect clapper and black rails:

If maintenance activities are scheduled during the nesting season (February 1st to August 31st, the County will retain a qualified biologist with a valid 10(A)(1)(a) permit for conducting California clapper transect surveys in potential habitat within 700 feet of the Project site. The biologist will submit a survey protocol to the U.S. Fish and Wildlife Service (USFWS) and DFG for approval prior to implementation. The methodology of this survey effort will be developed utilizing USFWS's December 2009 draft survey protocol for California clapper rail and augmented by the Point Reyes Bird Observatory Black Rail Survey Protocol by Jules Evens (unpublished). The following survey effort timing and methodology will be compliant with both protocols:

1. *Surveys will be conducted between January 15 and April 1;*

2. *A minimum of three individual passive-listening surveys will be conducted. If California clapper rails have not been detected after three passive-listening surveys, call-playback methods will be utilized adhering to the requirements of the permit on the fourth survey;*

3. *All surveys will be conducted no less than fourteen days apart from each other;*

4. *The listening station will be manned continuously by at least one biologist during each survey;*

5. Surveys will be conducted at sunrise or sunset. Protocol stipulates that surveys conducted at sunrise will begin 45 minutes before sunrise and continue until 1.25 hours after sunrise and that surveys conducted at sunset will begin 1.25 hours before sunset and continue for 45 minutes after sunset;

6. Surveys will not be conducted when tides greater than 4.5 feet NGVD are predicted at the Golden Gate Bridge during the survey period, or during full moon periods (i.e., clear nights within two days of the actual full moon);

7. Surveys will not be conducted when wind velocities exceed 10 miles-per hour (mph) or wind gusts exceed 12 mph or during moderate to heavy rains; and

8. All rail vocalizations will be noted, including the types, locations and times, on a detailed map of the survey area. Biologists will use compasses and distance sampling techniques to estimate the location of detected rails.

Response: Several of the sites are within (5-10 sites) or immediately adjacent (15-20 sites) to suitable habitat for California clapper rail and California black rails.

The following Avoidance and Minimization Measures shall apply to all sites in or near salt or brackish marshland and will also serve to protect other tidal-marsh dependent species such as saltmarsh common yellowthroat and San Pablo song sparrow.

- When working within 250 ft. of salt or brackish marshland during the period February 1st through August 31st, presence for either rail species shall be assumed.

For all maintenance activities except for mowing of levees:

- Maintenance activities shall be scheduled to occur between September 1st and January 31st to avoid the rail breeding season.

- Work shall be scheduled to occur between 8:00 AM and 4:00 PM in order to avoid early morning and late afternoon/evening hours when rails are most active.

- Work shall be scheduled to avoid periods of high tides, as the high water reduces the amount of refugial habitat for the rails. No work shall occur near salt marsh habitats within two hours before or after predicted extreme high tides of 6.5 ft above the National Geodetic Vertical Datum (NGVD), as measured at the Golden Gate Bridge, and adjusted to the timing of local extreme high tide events at the project sites.

- Activities shall proceed as quickly as possible to reduce disturbance from noise, dust, etc.

- Removal or disturbance of emergent tidal marsh vegetation shall be avoided, and removal or disturbance of vegetation at the tidal marsh/upland interface shall be avoided to provide a buffer of refugial habitat within as wide a swath as possible (3 meter minimum) from the Mean Higher High Water (MHHW) line. If removal is necessary, the work shall be scheduled outside of the breeding season (February 1 – August 31st); all vegetation shall be removed by hand, and shall be salvaged and retained for replacement after work is completed.

- If, for any reason other than fire fuel reduction levee mowing, the District must perform maintenance activities within 250 ft of salt or brackish marshland during the rail breeding season, the District shall retain a qualified biologist to conduct clapper rail surveys in accordance to most currently available protocols from the Department of Fish and Game and the US Fish and Wildlife Service.

Comment: On March 7, 2012, DFG updated the 1995 Staff Report on burrowing owl mitigation. DFG recommends revising Section BIRDS-3 to include these new guidelines which can be found at:
www.dfg.ca.gov/wildlife/nongame/docs/BUOWStaffReport.pdf.

Response: The following Avoidance and Minimization Measures have been included in the RMA program documents to protect burrowing owls:

BIRD-3: Raptors and wading birds- Several of the sites are adjacent to suitable habitat for raptors and wading birds. Although none of these species are listed, they are protected by the Migratory Bird Act, and impacts to them should be minimized.

Burrowing owls, a federal and state species of special concern, are not known at the sites and there are no CNDDB occurrence records for burrowing owl on or near the sites. However, if burrowing owls are observed and/or if signs are found, then guidelines as outlined in the DFG's 2012 Staff Report on Burrowing Owl Mitigation shall be followed.

If work occurs after the nesting season (August 31 – January 31), then avoidance has been achieved and work can proceed. During nesting season, (February 1st - September 1st), the ECC should walk the area of proposed activity each day before maintenance activities begin to determine presence of nesting raptors and wading birds. If none are observed, avoidance can be assumed and work can proceed.

Comment: DFG recommends that Mitigation Measure V.7(a)-44 and -45 be combined and revised to include the following language:

A qualified biologist should conduct a habitat assessment for potentially suitable bat habitat. If the survey reveals suitable bat habitat and tree removal is scheduled from April16 through August 31 and/or October 16 through February 28 then

presence/absence surveys should be conducted prior to any tree removal. If presence/absence surveys are negative then trees may be removed following the two-phase tree removal system. If presence/absence surveys result in bat occupancy then the occupied trees should only be removed from March 1 through April 15 and/or August 31 through October 15 following the two-phased tree removal system. If trees that are suitable for bat habitat are to be removed from March 1 through April 15 and/or.August 31 through October 15, then the trees should be removed following the two- phased removal system. The two-phased removal system should be conducted over two consecutive days. The first day (in the afternoon), limbs and branches would be removed by a tree cutter using chainsaws only. Limbs with cavities, crevices or deep bark fissures would be avoided, and only branches or limbs without those features would be removed. On the second day, the entire tree would be removed.

Response: These Avoidance and Minimization Measures have been revised in the RMA program documents as recommended.

Comment: The MND identified the possible presence of state-listed species such as, but not limited to, the Central California Coast coho salmon. The California Endangered Species Act (CESA) prohibits take of state-listed species. Please be advised that a CESA Permit must be obtained if the Project has the potential to result in take of species of plants or animals listed under CESA, either during construction or over the life of the Project. Issuance of a CESA Permit is subject to CEQA documentation; therefore the CEQA document must specify impacts, mitigations measures and a mitigation monitoring and reporting program. If the project will impact CESA listed species, early consultation is encouraged, as significant modifications to the Project and mitigation measures may be required in order to obtain a CESA Permit.

Response: Marin County Flood Control District acknowledges that a CESA permit is required if any work included in the RMA will have the potential to result in take of a state listed plant or animal. The District notes that there are no activities programmed to date that will cause take of state listed species, but if any new species are listed under CESA and the program has the potential to cause take of those species, the District will initiate early consultation with resource agencies regarding any new mitigations or modifications to the project that may be required to obtain a CESA Permit.

Comment: Page 23 of the draft MND states that there are potential wetlands in the Project area and that a formal wetland delineation will be completed for 38 sites during the spring and summer of 2012. These potential wetlands could be impacted by Project activities. The California Wetlands Conservation Policy goal is to ensure no overall net-loss of wetlands and to achieve a long-term net gain in the quantity, quality, and permanence of wetlands acreage. It is the policy of the Fish and Game Commission to seek to provide for the protection, preservation, restoration, enhancement, and expansion of wetland habitat in California. The Fish and Game Commission's Wetland Policy stresses the need to compensate for the loss of wetland habitat on an acre-for-acre basis. For every acre of wetland loss, no less than an acre

of wetland must be created from non-wetland habitat. This amount may increase based on the quality of the impacted wetlands. DFG recommends that the Project avoid potential wetland impacts. If avoidance is not possible, fill of wetlands should be minimized and mitigated and such measures should be detailed in the MND.

Response: The estimated number of sites that may be potentially identified as wetlands has been revised from 38 to 17. These sites will be identified during formal wetland delineation and all project activities within a delineated wetland area will avoid direct impacts to the wetland areas. No permanent impacts or fill of wetlands will occur at these sites.

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3) Letter from Gary Arnold; District Branch Chief of Local Development and Intergovernmental Review of State Department of Transportation (CalTrans) dated 12-17-10 and 3-07-12;

Comment: Letter was sent to advise the District that any work or traffic control that encroaches onto State ROW requires an encroachment permit issued by the Department of Transportation.

Response: The District will notify CalTrans and obtain an encroachment permit if any work or traffic control related to the project encroaches to State ROW.

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4) Letter from Barbara Salzman and Phil Peterson; Marin Audubon Society, dated 3-22-12;

Comments: If non-native invasive plants are removed the denuded areas should be replanted with native plants.

Response: Activities conducted for flood control purposes minimize ground disturbance when removing non-native plants. Areas are replanted with seeds and native plants and treated with erosion control measures.

Comment: Mowing for fire fuel reduction could adversely impact avian species nesting along levees.

Response: Avoidance and Minimization Measure (below) has been revised to include mowing of levees:

V.7(a)-21 If work in the riparian zone *or mowing on levees* will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests

are found, the ECC shall postpone maintenance activities for that site until the young have left the nest and will no longer be impacted by the project.

Comment: Fallen trees in streams can provide important refuge habitat for fish. Before removal the habitat function that they serve should be assessed. Non-native trees should be left in place if they provide habitat or the habitat function they provide should be replaced in a manner that minimizes fuel build-up.

Response: The role of the Environmental Compliance Coordinator is to walk the site with the project manager before any work begins to assess what vegetation and debris need to be removed and what may remain in the creek. The ECC will be trained and knowledgeable of the benefits of leaving wood in the creek for habitat and will only instruct wood to be removed if it is causing an obstruction that could lead to damage to infrastructure or increase in potential risk for flooding.

Comment: AMMs in Section 7 should include protections for non-listed birds. This is important because many migratory and resident species will be nesting in habitats within the program area.

Response- The following Avoidance and Minimization Measures apply to all birds, not just listed species:

V.7(a)-20. Work window: At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start after July 31st, potential impacts will be avoided and no surveys will be required. Because the culverts in the proposed project sites are fairly small, there is minimal likelihood that they would provide suitable habitat for swallows. However, if any culverts show evidence of past or current swallow nesting, the ECC shall identify them and maintenance activities shall occur after August 31 or after all swallows have fledged to avoid impacts.

V.7(a)-21. If work in the riparian zone *or mowing on levees* will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until the young have left the nest and will no longer be impacted by the project.

Comment: Timing issue with work window. Surveys and stop work orders should continue through August for species that re-nest or nest late. Surveys should be conducted within several days of commencement of the work to avoid losing a nest that may be constructed between survey date and work start.

Response: Avoidance and Minimization Measures V.7(a)-2. And V.7(a)-21 (*revised versions below*) protect nesting birds that may be found in the proposed work area both before and after July 31st.:

V.7(a)-2. Assessment, Buffers, and Stop Work Orders- The ECC shall assess field conditions at the start of each work day. If any special status species or nesting birds are observed, the ECC shall coordinate with the contractor foreman to either establish buffers areas, if sufficient, or to stop any activity the ECC deems may result in take or destruction of habitat. Stopped work shall not be allowed to resume until appropriate corrective measures have been completed or it has been determined that nesting is complete. The ECC shall immediately report any unauthorized impacts to the appropriate trustee agency (i.e. USACE, USFWS, NMFS, and/or CDFG).

V.7(a)-21. If work in the riparian zone *or mowing on levees* will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until the young have left the nest and will no longer be impacted by the project.

Comment: Non-native invasive plants should be removed whenever possible. Need to wash tool and clean clothes to avoid spread of non-native invasive plants.

Response: The STRAW program focuses on removal of non-native invasive plants in the riparian zone. STRAW follows the protocols and BMPs identified in the CCNB database for preventing the transfer of invasive plant materials, seeds or disease from one location to another.

Comment: Reach of Arroyo de San Jose adjacent to Bel Marin Keys Blvd. and extending east is owned by Marin Audubon Society. We are pleased about flood control activities but worried about impacts. Encourage non-native removal but not native removal. To avoid nesting impacts perform work after Aug 31. Please notify when work will occur if possible. Take extra care to perform surveys and implement AMMs in this reach (noted Green Heron nest)

Response: The project description includes guidance for removing invasive non-native plants and re-vegetating with native plants where necessary to control erosion and maintain riparian habitat. Native plants are not removed. Birds nesting before and after July 31st are protected by the following Avoidance and Minimization Measures:

Assessment, Buffers, and Stop Work Orders- The ECC shall assess field conditions at the start of each work day. If any special status species or nesting birds are observed, the ECC shall coordinate with the contractor foreman to either establish buffers areas, if sufficient, or to stop any activity the ECC deems may result in take or destruction of habitat. Stopped work shall not be allowed to resume until appropriate corrective measures have been completed or it has been determined that nesting is complete. The ECC shall immediately report any unauthorized impacts to the appropriate trustee agency (i.e. USACE, USFWS, NMFS, and/or CDFG).

If work in the riparian zone or mowing on levees will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until the young have left the nest and will no longer be impacted by the project.

Comment: Map 5 Bel Aire Watershed- take care in this area to leave native plants between houses and tidal marsh during fire fuel reduction activities. If not possible to retain natives because of density of non-natives, replant with native shrubs and grasses immediately.

Response: Comment noted.

Comment: Delete the tidal reach of Larkspur Creek from fire fuel reduction. It is extremely unlikely that fire fuels would build-up in this reach and it is in violation of the permit conditions for this program.

Response: The District does not conduct fire fuel reduction activities in the tidal reach area of Larkspur Creek, just limbing and trimming for flood control purposes

---

5) Letter from Sandy Guldman; friends of Corte Madera Creek; CA, dated 3-20-12;

Comments: Map Corrections

On Map 8, the portion of Murphy Creek coincident with Kent Avenue is shown as a site for vegetation maintenance. In fact, Murphy Creek enters a culvert when it meets Kent Avenue, so there is no vegetation to maintain.

On Map 9, it appears that the course of Ross Creek should be adjusted to match the recent LIDAR topography.

Response: Map Corrections noted

Comments: Scope of Maintenance:

Map 7 shows vegetation maintenance along the tidal reach of Larkspur Creek (9-LAR-1); the creek in this reach has tidal marsh plants and does not need maintenance. Currently, adjacent riparian areas on the right bank are maintained by Friends of Corte Madera Creek Watershed. Non-native vegetation along the left bank will be removed and native plants installed as part of the Rose Garden project, which is just beginning.

One site on Map 8 is designated for fuels reduction. It seems unlikely that there is any riparian vegetation that should be removed to reduce fuels. The site is along a berm

adjacent to wetlands; it appears that a very much smaller area could be designated for fuels management, focusing on the area nearest the homes.

One site on Map 9 has a few broom plants on the bank of Corte Madera Creek, but great care should be taken during vegetation maintenance on that site because it is an important source of dogwood cuttings for revegetation projects. The upland areas are limited in extent and could be easily mowed without impacting riparian vegetation.

Four new culverts were installed during the Kentfield Force Main replacement project: one on Beren's Drainage and three on McAllister Slough. The interiors of these culverts should be cleaned regularly to prevent the growth of organisms and the accumulation of debris, both of which would reduce capacity. Although we appreciate the emphasis on limiting maintenance to protect resources, leaving out cleaning the interiors of culverts overlooks the value of maintaining flow.

The tide gate on the Berens Drainage, to comply with California Department of Fish and Game conditions, should be kept open during the summer to allow tidal flow into the wetland.

One site on Map 9 has a few broom plants on the bank of Corte Madera Creek, but great care should be taken during vegetation maintenance on that site because it is an important source of dogwood cuttings for revegetation projects. The upland areas are limited in extent and could be easily mowed without impacting riparian vegetation.

Response: Comments noted and information passed on to project manager.

Comments : Mitigation Measures: Starting at the bottom of page 43, BIRD-4 identifies measures to protect various birds. We urge you to carefully enforce these measures, including establishing non-disturbance buffer zones around nests or avoiding work at the site.

Response: Mitigation measure V.7(a)-2 addresses this issue:

V.7(a)-2. Assessment, Buffers, and Stop Work Orders- The ECC shall assess field conditions at the start of each work day. If any special status species or nesting birds are observed, the ECC shall coordinate with the contractor foreman to either establish buffers areas, if sufficient, or to stop any activity the ECC deems may result in take or destruction of habitat. Stopped work shall not be allowed to resume until appropriate corrective measures have been completed or it has been determined that nesting is complete. The ECC shall immediately report any unauthorized impacts to the appropriate trustee agency (i.e. USACE,
USFWS, NMFS, and/or CDFG).

Comment: The last paragraph on page 47 reads: the ECC shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed. As a precaution against invasive quagga and zebra mussels, if kayaks or

any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary.

The spread of invasive upland plants and diseases is also a serious concern. We request that you add a requirement that tires, equipment, boots, clothing, and any other item that could transfer seeds or disease be thoroughly washed before being moved between work areas in different sub-watersheds.

Response: Comments noted.

Comment: To improve readability (and printability for those of us who do not have plotters), we also recommend that the large table in Attachment B be divided up so that each zone is in a separate table.

Response: Comment noted

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6) E-mail from Sebastyen Jackovics dated 3-07-12;

Comment: We request notification of all projects as it may relate to Marin County Flood Control and Conservation actions within the area effecting our properties in Corte Madera at 101 Nellen; 150 Nellen; 110 Nellen; 200 Nellen; 10 Fifer; and 2 Fifer

Response: The proposed project activities will be conducted on public lands owned or under easement by the County of Marin. No work will be conducted on private property unless the Marin County Flood Control District enters into an agreement with the private landowner with a Right-to-Enter for construction agreement in place.

Comment: We also want to bring our concerns about additional run off and flooding issues that will likely be created by road and freeway modifications as it relates to the possible 101 freeway project at the Lucky Drive interchanges.

Response: Highway 101 is a State Highway and any work done would be under the jurisdiction of CalTrans, not the Marin County Flood Control District.

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7) E-mail from Eva Buxton; California Native Plant Society; dated 3-19-12

Comments: Please let me know if any impacts to special-status species are expected in the present project.

Response: We don't anticipate impacts to listed plant species with this project since the work is routine maintenance on sites that have been regularly disturbed for flood protection for many years. Any listed plants or animals with the potential to occur in the project areas have Avoidance and Minimization Measures in place to identify them via pre-project surveys or to protect them during project implementation.

---

8) E-mail from Doreen Smith; California Native Plant Society; dated 3-19-12

Comments: I'm assuming that the Flood Control district will be doing surveys and follow the protocol outlined in supporting documents: Marin County Flood Control - RMA Program Supporting Documents below: (basis for the Neg Dec)?

(4.4; PLA-2; p. 32-33) "If suitable habitat is determined to be present within the maintenance site, botanical surveys should be conducted before activities commence to determine whether any special status plant species are present. Rare plant surveys, if necessary, should be conducted following the Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities (CDFG 2009b) and Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed and Candidate Plants (U.S. Fish and Wildlife Service 2000). Surveys should be conducted in the field when species are both evident and identifiable, normally during flowering or fruiting. Multiple visits to a site may be necessary to capture the floristic diversity present at the site. If listed species are observed or presumed present, then the ECC should take such action as is necessary to protect the plants, using fencing, buffers, etc. If possible and practicable, the project should be redesigned to avoid listed plant species.

For all observed special status species, the ECC should complete and submit a California Native Species (or Community) Field Survey Form to the CNDDB documenting the species and location."

Response: Yes, following the protocols outlined above is integrated into the Routine Maintenance Activities Program.

Comments: Regarding plant species of concern: Pt. Reyes Bird's beak, Cordylanthus maritimus ssp. palustris is strictly a plant of saltmarshes, it's taxonomy has been updated to Chloropyron maritimum ssp. palustre.

Pale yellow tarplant/hayfield tarplant has had a significant taxonomic revison: what once was recognized as Hemizonia congesta ssp. leucophylla is now known to be H. congesta ssp. congesta .It has WHITE flowers (that may turn yellow in dried herbarium specimens) . It is fairly common in grassland in theTomales area but very rarely encountered otherwise in Marin County. The common grassland yellow tarplant, ONCE THOUGHT to be H. congesta spp. congesta is NOW H. congesta ssp. lutescens and is NOT a species of concern. Marsh microseris, Microseris paludosa, so far seems to be extiripated from all historic locations except on Pt. Reyes Peninsula. It grows in seasonally moist grassland swales. Marin knotweed, Polygonum marinense, grows at the high tideline with pickleweed, Salicornia pacifica, in saline and brackish marshes .

Response: Comments noted.

STATE OF CALIFORNIA
GOVERNOR'S OFFICE *of* PLANNING AND RESEARCH

EDMUND G. BROWN JR.
GOVERNOR

KEN ALEX
DIRECTOR

March 22, 2012

Kallie Kull
Marin County Flood Control District and Water Conservation
3501 Civic Center Drive, Rm 304
San Rafael, CA 94903

Subject: Marin County Flood Control Routine Maintenance Activities Program
SCH#: 2012022053

Dear Kallie Kull:

The State Clearinghouse submitted the above named Mitigated Negative Declaration to selected state agencies for review. On the enclosed Document Details Report please note that the Clearinghouse has listed the state agencies that reviewed your document. The review period closed on March 21, 2012, and the comments from the responding agency (ies) is (are) enclosed. If this comment package is not in order, please notify the State Clearinghouse immediately. Please refer to the project's ten-digit State Clearinghouse number in future correspondence so that we may respond promptly.

Please note that Section 21104(c) of the California Public Resources Code states that:

> "A responsible or other public agency shall only make substantive comments regarding those activities involved in a project which are within an area of expertise of the agency or which are required to be carried out or approved by the agency. Those comments shall be supported by specific documentation."

These comments are forwarded for use in preparing your final environmental document. Should you need more information or clarification of the enclosed comments, we recommend that you contact the commenting agency directly.

This letter acknowledges that you have complied with the State Clearinghouse review requirements for draft environmental documents, pursuant to the California Environmental Quality Act. Please contact the State Clearinghouse at (916) 445-0613 if you have any questions regarding the environmental review process.

Sincerely,

Scott Morgan
Director, State Clearinghouse

Enclosures
cc: Resources Agency

Document Details Report
State Clearinghouse Data Base

SCH# 2012022053
Project Title Marin County Flood Control Routine Maintenance Activities Program
Lead Agency Marin County Flood Control District

Type MND Mitigated Negative Declaration

Description The RMA program covers five types of routine flood control maintenance activities: 1) Vegetation management; 2) Sediment and debris removal; 3) Erosion control; 4) Maintenance and repair of flood control structures; and 5) Levee maintenance. The primary purpose of the program is to reduce the potential risk of flooding and associated damage to adjacent properties and infrastructure such as bridges, culverts, roads and flood control facilities.

Lead Agency Contact

Name Kallie Kull
Agency Marin County Flood Control District and Water Conservation
Phone 415 473 6532 **Fax**
email
Address 3501 Civic Center Drive, Rm 304
City San Rafael **State** CA **Zip** 94903

Project Location

County Marin
City Unincorporated
Region
Lat / Long
Cross Streets
Parcel No. County jurisdictions
Township **Range** **Section** **Base**

Proximity to:

Highways Hwy 101
Airports
Railways
Waterways numerous East Marin County waterways
Schools
Land Use

Project Issues Aesthetic/Visual; Agricultural Land; Air Quality; Archaeologic-Historic; Biological Resources; Drainage/Absorption; Flood Plain/Flooding; Forest Land/Fire Hazard; Geologic/Seismic; Minerals; Noise; Public Services; Recreation/Parks; Soil Erosion/Compaction/Grading; Toxic/Hazardous; Traffic/Circulation; Vegetation; Water Quality; Water Supply; Wetland/Riparian; Landuse

Reviewing Agencies Resources Agency; Department of Fish and Game, Region 3; Department of Parks and Recreation; Department of Water Resources; Office of Emergency Management Agency, California; California Highway Patrol; Caltrans, District 4; State Water Resources Control Board, Division of Water Rights; Regional Water Quality Control Board, Region 2; Department of Toxic Substances Control; Native American Heritage Commission

Date Received 02/21/2012 **Start of Review** 02/21/2012 **End of Review** 03/21/2012

Note: Blanks in data fields result from insufficient information provided by lead agency.

STATE OF CALIFORNIA—BUSINESS, TRANSPORTATION AND HOUSING AGENCY EDMUND G. BROWN Jr., Governor

DEPARTMENT OF TRANSPORTATION
111 GRAND AVENUE
P. O. BOX 23660
OAKLAND, CA 94623-0660
PHONE (510) 286-5541
FAX (510) 286-5559
TTY 711

Flex your power!
Be energy efficient!

3/21/12 Clearinghouse

March 7, 2012

MRN000074
SCH 2012022053

Ms. Kallie Kull
Marin County Flood Control and Water Conservation District
3501 Civic Center Drive, Room 304
San Rafael, CA 94903

Dear Ms. Kull:

Marin County Flood Control Routine Maintenance Activities Program – Mitigated Negative Declaration

Thank you for including the California Department of Transportation (Department) in the environmental review process for the proposed project. The Department is particularly concerned with the potential for work within State right-of-way (ROW), particularly on US-101 and/or State Route (SR) 37.

Encroachment Permit
Please be advised that any work or traffic control that encroaches on State ROW requires an encroachment permit issued by the Department. Further information is available on the following website: http://www.dot.ca.gov/hq/traffops/developserv/permits/.

To apply, a completed encroachment permit application, environmental documentation, and five (5) sets of plans clearly indicating State ROW must be submitted to the address below. Traffic-related mitigation measures should be incorporated into the construction plans during the encroachment permit process.

Office of Permits
California Department of Transportation, District 4
P.O. Box 23660
Oakland, CA 94623-0660

Should you require further information or have any questions regarding this letter, please contact Connery Cepeda of my staff at (510) 286-5535.

Sincerely,

GARY ARNOLD
District Branch Chief
Local Development – Intergovernmental Review

c: Scott Morgan (State Clearinghouse)

State of California – The Natural Resources Agency
DEPARTMENT OF FISH AND GAME
Bay Delta Region
7329 Silverado Trail
Napa, CA 94558
(707) 944-5500
www.dfg.ca.gov

EDMUND G. BROWN JR., Governor
CHARLTON H. BONHAM, Director

March 19, 2012

Ms. Kallie Kull
Marin County Flood Control and Water Conservation District
3501 Civic Center Drive, Room 304
San Rafael, CA 94903

Dear Ms. Kull:

Subject: Marin County Flood Control Routine Maintenance Activities Program, Mitigated Negative Declaration, SCH #2012022053, Marin County

The Department of Fish and Game (DFG) has reviewed the draft Mitigated Negative Declaration (MND) for the Marin County Flood Control Routine Maintenance Activities Program (Project). DFG is providing comments on the draft MND as a Trustee Agency and Responsible Agency. As Trustee for the State's fish and wildlife resources, DFG has jurisdiction over the conservation, protection, and management of the fish, wildlife, native plants, and the habitat necessary for biologically sustainable populations of such species for the benefit and use by the people of California.

The proposed Project is a program of routine maintenance flood control activities that will be implemented by the Marin County Flood Control and Water Conservation District. Activities will be located within eastern Marin County and include the Novato, Richards Bay, Bel Air and Strawberry Circle, Santa Venetia, and Ross Valley Flood Control Zones (#1, 3, 4, 7, and 9, respectively), as well as the Upper Lucas Valley which is defined as County Service Area 13. Within these Flood Control Zones and Service Area, five general types of flood control activities are proposed. These are: 1) vegetation management, 2) sediment and debris removal, 3) erosion control, 4) maintenance and repair of flood control structures, and 5) levee maintenance. Ninety three (93) specific sites have been identified in this Project.

General Comments

This Project will impact the bed, bank, channel, and riparian vegetation along numerous streams in the Project area. For any activity that will divert or obstruct the natural flow, or change the bed, channel, or bank (which may include associated riparian resources) of a river or stream, or use material from a streambed, DFG may require a Lake and Streambed Alteration Agreement (LSAA), pursuant to Section 1600 et seq. of the Fish and Game Code, with the applicant. Issuance of an LSAA is subject to the California Environmental Quality Act (CEQA). DFG, as a responsible agency under CEQA, will consider the CEQA document for the Project. The CEQA document should fully identify the potential impacts to the stream or riparian resources and provide adequate avoidance, mitigation, monitoring

and reporting commitments for completion of the agreement. To obtain information about the LSAA notification process, please access our website at http://www.dfg.ca.gov/habcon/1600/; or to request a notification package, contact the Lake and Streambed Alteration Program at (707) 944-5520.

DFG recommends that all mitigation measures within the draft MND include the word "shall" as apposed to "should." For example, see Mitigation Measures V.7(a)-48-51.

On page 43, BIRD-1, DFG recommends that all mitigation measures apply to sites that are within 700 feet of salt or brackish tidal marshland. Similarly, Mitigation Measures V.7(a)-24 and 25 should be revised to include a 700-foot buffer.

DFG recommends that Mitigation Measure V.7(a)-23 be revised to state that no work shall occur near the salt marsh within two hours before or after predicted extreme high tides of 6.5 feet above the National Geodetic Vertical Datum (NGVD), as measured at the Golden Gate Bridge, and adjusted to the timing of local extreme high tide events at the Project site. DFG recommends Mitigation Measure V.7(a)-24 be revised to include the following language:

> The County will retain a qualified biologist with a valid 10(A)(1)(a) permit for conducting California clapper transect surveys in potential habitat within 700 feet of the Project site. The biologist will submit a survey protocol to the U.S. Fish and Wildlife Service (USFWS) and DFG for approval prior to implementation. The methodology of this survey effort will be developed utilizing USFWS's December 2009 draft survey protocol for California clapper rail and augmented by the Point Reyes Bird Observatory Black Rail Survey Protocol by Jules Evens (unpublished). The following survey effort timing and methodology will be compliant with both protocols:
>
> 1. Surveys will be conducted between January 15 and April 1;
>
> 2. A minimum of three individual passive-listening surveys will be conducted. If California clapper rails have not been detected after three passive-listening surveys, call-playback methods will be utilized adhering to the requirements of the permit on the fourth survey;
>
> 3. All surveys will be conducted no less than fourteen days apart from each other;
>
> 4. The listening station will be manned continuously by at least one biologist during each survey;
>
> 5. Surveys will be conducted at sunrise or sunset. Protocol stipulates that surveys conducted at sunrise will begin 45 minutes before sunrise and continue until 1.25 hours after sunrise and that surveys conducted at sunset will begin 1.25 hours before sunset and continue for 45 minutes after sunset;

6. Surveys will not be conducted when tides greater than 4.5 feet NGVD are predicted at the Golden Gate Bridge during the survey period, or during full moon periods (i.e., clear nights within two days of the actual full moon);

7. Surveys will not be conducted when wind velocities exceed 10 miles-per-hour (mph) or wind gusts exceed 12 mph or during moderate to heavy rains; and

8. All rail vocalizations will be noted, including the types, locations and times, on a detailed map of the survey area. Biologists will use compasses and distance sampling techniques to estimate the location of detected rails.

DFG recommends that Mitigation Measure V.7(a)-26 be revised to state that any tidal marsh vegetation removal be conducted outside of the breeding season. All vegetation removal should be conducted by hand. To the extent possible, salt mash vegetation should be salvaged and placed back on-site with intention and care given so that the vegetation may reestablish.

On March 7, 2012, DFG updated the 1995 Staff Report on burrowing owl mitigation. DFG recommends revising Section BIRDS-3 to include these new guidelines which can be found at: www.dfg.ca.gov/wildlife/nongame/docs/BUOWStaffReport.pdf.

DFG recommends that Mitigation Measure V.7(a)-44 and -45 be combined and revised to include the following language:

> A qualified biologist should conduct a habitat assessment for potentially suitable bat habitat. If the survey reveals suitable bat habitat and tree removal is scheduled from April 16 through August 31 and/or October 16 through February 28 then presence/absence surveys should be conducted prior to any tree removal. If presence/absence surveys are negative then trees may be removed following the two-phase tree removal system. If presence/absence surveys result in bat occupancy then the occupied trees should only be removed from March 1 through April 15 and/or August 31 through October 15 following the two-phased tree removal system. If trees that are suitable for bat habitat are to be removed from March 1 through April 15 and/or August 31 through October 15, then the trees should be removed following the two-phased removal system. The two-phased removal system should be conducted over two consecutive days. The first day (in the afternoon), limbs and branches would be removed by a tree cutter using chainsaws only. Limbs with cavities, crevices or deep bark fissures would be avoided, and only branches or limbs without those features would be removed. On the second day, the entire tree would be removed.

The MND identified the possible presence of state-listed species such as, but not limited to, the Central California Coast coho salmon. The California Endangered Species Act (CESA) prohibits take of state-listed species. Please be advised that a CESA Permit must be obtained if the Project has the potential to result in take of species of plants or animals listed under CESA, either during construction or over the life of the Project. Issuance of a CESA

Permit is subject to CEQA documentation; therefore, the CEQA document must specify impacts, mitigation measures, and a mitigation monitoring and reporting program. If the Project will impact CESA listed species, early consultation is encouraged, as significant modification to the Project and mitigation measures may be required in order to obtain a CESA Permit.

Page 23 of the draft MND states that there are potential wetlands in the Project area and that a formal wetland delineation will be completed for 38 sites during the spring and summer of 2012. These potential wetlands could be impacted by Project activities. The California Wetlands Conservation Policy goal is to ensure no overall net-loss of wetlands and to achieve a long-term net gain in the quantity, quality, and permanence of wetlands acreage. It is the policy of the Fish and Game Commission to seek to provide for the protection, preservation, restoration, enhancement, and expansion of wetland habitat in California. The Fish and Game Commission's Wetland Policy stresses the need to compensate for the loss of wetland habitat on an acre-for-acre basis. For every acre of wetland loss, no less than an acre of wetland must be created from non-wetland habitat. This amount may increase based on the quality of the impacted wetlands. DFG recommends that the Project avoid potential wetland impacts. If avoidance is not possible, fill of wetlands should be minimized and mitigated and such measures should be detailed in the MND.

If you have any questions, please contact Mr. Timothy Dodson, Environmental Scientist, at (707) 944-5513 or by email at tdodson@dfg.ca.gov; or Ms. Stephanie Buss, Staff Environmental Scientist, at (707) 944-5502.

Sincerely,

Scott Wilson
Acting Regional Manager
Bay Delta Region

cc: State Clearinghouse

Friends of Corte Madera Creek Watershed

P.O. Box 415 · Larkspur · California 94977

info@friendsofcortemaderacreek.org (415) 456-5052 www.friendsofcortemaderacreek.org

March 20, 2012

Kallie Kull, Senior Planner
Marin County DPW
3501 Civic Center Drive Room 304
San Rafael CA 94903

RE: Routine Maintenance Program (RMA) in Eastern Marin County
Draft Negative Declaration of Environmental Impact

Dear Ms. Kull, Kallie

Friends of Corte Madera Creek Watershed appreciates the opportunity to comment on the RMA Negative Declaration. In general, we are impressed by the scope of the documents. Our comments are in three categories: map corrections, scope of maintenance, and mitigation measures.

Map Corrections:

1. On Map 8, the portion of Murphy Creek coincident with Kent Avenue is shown as a site for vegetation maintenance. In fact, Murphy Creek enters a culvert when it meets Kent Avenue, so there is no vegetation to maintain.
2. On Map 9, it appears that the course of Ross Creek should be adjusted to match the recent LIDAR topography.

Scope of Maintenance:

3. Map 7 shows vegetation maintenance along the tidal reach of Larkspur Creek (9-LAR-1); the creek in this reach has tidal marsh plants and does not need maintenance. Currently, adjacent riparian areas on the right bank are maintained by Friends of Corte Madera Creek Watershed. Non-native vegetation along the left bank will be removed and native plants installed as part of the Rose Garden project, which is just beginning.
4. One site on Map 8 is designated for fuels reduction. It seems unlikely that there is any riparian vegetation that should be removed to reduce fuels. The site is along a berm adjacent to wetlands; it appears that a very much smaller area could be designated for fuels management, focusing on the area nearest the homes.
5. One site on Map 9 has a few broom plants on the bank of Corte Madera Creek, but great care should be taken during vegetation maintenance on that site because it is an important source of dogwood cuttings for revegetation projects. The upland areas are limited in extent and could be easily mowed without impacting riparian vegetation.
6. Four new culverts were installed during the Kentfield Force Main replacement project: one on Berens Drainage and three on McAllister Slough. The interiors of these culverts should be cleaned regularly to prevent the growth of organisms and the accumulation of debris, both of which would reduce capacity. Although we

appreciate the emphasis on limiting maintenance to protect resources, leaving out cleaning the interiors of culverts overlooks the value of maintaining flow. Also, the tide gate on the Berens Drainage, to comply with California Department of Fish and Game conditions, should be kept open during the summer to allow tidal flow into the wetland.

7. One site on Map 9 has a few broom plants on the bank of Corte Madera Creek, but great care should be taken during vegetation maintenance on that site because it is an important source of dogwood cuttings for revegetation projects. The upland areas are limited in extent and could be easily mowed without impacting riparian vegetation.

Mitigation Measures:

8. Starting at the bottom of page 43, BIRD-4 identifies measures to protect various birds. We urge you to carefully enforce these measures, including establishing non-disturbance buffer zones around nests or avoiding work at the site.

9. The last paragraph on page 47 reads:
The ECC shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed. As a precaution against invasive quagga and zebra mussels, if kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary.

   The spread of invasive upland plants and diseases is also a serious concern. We request that you add a requirement that tires, equipment, boots, clothing, and any other item that could transfer seeds or disease be thoroughly washed before being moved between work areas in different sub-watersheds.

To improve readability (and printability for those of us who do not have plotters), we also recommend that the large table in Attachment B be divided up so that each zone is in a separate table.

Sincerely,

Sandy

Sandra Guldman, President

Marin Audubon Society

P.O. Box 599 | Mill Valley, CA 94942-0599 | marinaudubon.org

March 22, 2012

Kalli Kull, Senior Planner
Marin County DPW
3501 Civic Center Drive, Rm. 304
San Rafael, CA 94993

RE: MARIN COUNTY FLOOD CONTROL ROUTINE MAINTENANCE PROGRAM

Dear Ms. Kull:

Marin Audubon appreciates the opportunity to comment on the routine maintenance program and thank you for sending the draft Negative Declaration, maps and plans related to this program. The stated purpose of the program is to reduce the risk of flooding on Marin County streams in and around flood control facilities. The program is intended to avoid high impact activities, such as major dredging projects and DPW is seeking a general permit for these activities.

The project plans contain many conditions that, if followed, will provide important protections for wildlife and their habitats, such as leaving snags and retaining maximum vegetation. We have the following comments and questions:

- While the purpose of the project is flood control, the scope of work includes "fire fuel reduction" activities to reduce fuel loads. A fuel reduction purpose is likely to have a more aggressive approach to vegetation removal which could be in conflict with protecting the natural environment that is discussed in this Negative Declaration. The fuel reduction measures are apparently achieved by (p. 5) removing invasive non-native species, mowing the tops of banks and levees, and removing downed trees.

We have no problem with removing non-native invasive species as long as the denuded areas are revegetated with native plants. Mowing the upper parts of levees or berms, however, could adversely impact avian species nesting along levees. Fallen trees in streams can provide important refuge habitat for fish. Before removal, the habitat function that they serve should be assessed. Non-native trees should be left in place if they provide habitat, or the habitat function they provide should be replaced in a manner that minimizes fuel build up.

- CWP Policy BIO 1.1 and BIO 2.5 call for protecting migratory species and wildlife movement corridors. The discussion only addresses requiring surveys for special status species and wetlands which do not comply with BIO 1.1 and BIO 2.5. There are General Conditions and Avoidance and Minimization Measures for non-special status nesting species but these are not mentioned.

The BIOLOGICAL RESOURCES (7.) discussion lists "proposed" Mitigations "to avoid and minimize the reduction in the number of endangered, threatened and rare species or alteration of their habitat...." These Mitigations include GENERAL CONDITIONS and SPECIES SPECIFIC AVOIDANCE AND MINIMIZATION MEASURES for birds, raptors, wading birds and land birds. We, however, could not find a commitment to implement the measures for non-listed birds. This is important because many migratory and resident species will be nesting in habitats that are covered by this program.

- There appear to be some discrepancies in the timing of the work windows. CWP BIO 2.5 calls for restricting disturbance in sensitive habitat during nesting season from March 1 through August 1 to protect bird nesting, rearing and feeding activities. The general work window, however, would allow work in that time period, from April 15 to October 15. The general work window for birds begins July 31, which is fine. It should be recognized, however, that some species nest late and some re-nest, particularly if there has been problem with their first attempt. Surveys and stop work order requirements should continue through August for landbirds, raptors and wading birds to ensure protection of nests. In addition, except during the very end of the nesting season, surveys should be conducted within several days of the commencement of work to avoid losing a nest that may be constructed in the interim.

- Invasive non-native plants should be removed wherever possible. In addition to the transport methods noted on page 50, seeds and pieces of invasive plants can be transported in clothing, shoes and work equipment (clippers, shovels, spades, etc.). In order to prevent or minimize the spread of invasives, the above mentioned clothing and equipment should be washed or cleaned at each new site. This should apply to eh STRAW program as well.

Comments on Maps:

Map 2 Novato. The reach of Arroyo de San Jose adjacent to Bel Marin Keys Boulevard extending east and downstream of the Humane society is owned by MAS. Mas property is a dense mix of native riparian and non-native species. Vegetation maintenance is shown for this segment and fuel reduction is shown further downstream. While we are pleased that the county maintains flood control responsibility, we are also concerned about impacts. We encourage removal of non-natives but not natives and, to avoid nesting impacts, we ld like the work should be performed in the non-nesting season after August 31. If possible we would like to kn/ow what work is planned and when it will be performed.

We also note that particular care should be taken in performing surveys and avoidance measures along this creek. It was further downstream on this where the Green Heron nest was cut down some years ago in the process of removing a tree limb.

Map 5 Bel Aire Watershed. The small area adjacent to the north of the tidal marsh is shown for fuel reduction. This area provides a buffer from uses of adjacent houses. It is important that a fringe of native species remain for refuge habitat along the marsh edge. Care should be taken to leave natives wherever possible. If this is not possible, and if there are many non-natives, the area should be revegetated with native shrub and grass species quickly.

Maps 7 and 8 Map 7 shows vegetation maintenance along Larkspur Creek and Map 8 shows an even longer stretch of Larkspur Creek that is slated for fuel reduction Larkspur Creek is tidal to upstream beyond Doherty Drive. Removing vegetation through this reach is not only unnecessary, but would remove tidal marsh vegetation and would be in violation of the condition for this permit It is extremely unlikely that any vegetation would be a fuel risk in this section. The tidal reach of Larkspur Creek should be deleted from the program.

Map 9 The section identified as for fuel reduction does not appear to be necessary. Care should be taken to remove non-native broom.

Thank you for considering our comments.

Sincerely,

Barbara Salzman, Co-chair
Conservation Committee

Phil Peterson, Co-chair
Conservation Committee

Kull, Kallie

:
Subject: Kull, Kallie
RE: No 227 February 22, 2012

From: seb [mailto:sjackovics@aol.com]
Sent: Wednesday, March 07, 2012 2:12 PM
To: EnvPlanning,
Cc: zsolt@ggsf.com; t.jackovics@comcast.net
Subject: No 227 February 22, 2012

Kallie Kull and to whom it may concern,

We write you on behalf of the ownership for commercial properties located in Corte Madera at the following addresses:

101 Nellen

150 Nellen

110 Nellen

200 Nellen

10 Fifer

Fifer

We request notification of all projects as it may relate to Marin County Flood Control and Conservation actions within the area effecting our properties in Corte Madera.

We also want to bring our concerns about additional run off and flooding issues that will likely be created by road and freeway modifications as it relates to the possible 101 freeway project at the Lucky Drive interchanges.

Please keep us informed and log our concerns and ADDRESS in the EIR process.

Sincerely,

Sebastyen Jackovics

Kull, Kallie

:
Subject:

Kull, Kallie
RE: Marin CNPS

From: Eva Buxton [mailto:evabuxton@sbcglobal.net]
Sent: Tuesday, March 20, 2012 8:24 PM
To: Choo, Chris
Cc: Kull, Kallie; Williams, Laurie; Lewis, Liz; Doreen Smith; carnelian@pacbell.net
Subject: Re: Marin CNPS

Hi,

I'm sorry that I was not aware of the fact that CNPS is always notified when a CEQA document is prepared for a County project, including private ones. I know now! I assume that the areas to be impacted have been surveyed by a botanist or someone with enough botanical knowledge to id the plants of concern, as was outlined in the Neg Dec and its supporting document. I understand that Doreen offered to help out. Although I normally comment on CEQA documents, I would not be able to do so before the deadline this coming Thursday. I would appreciate it if CNPS could receive notifications of projects a little more in advance in order for volunteers to address issues.

. lease let me know if any impacts to special-status species are expected in the present project.

Eva Buxton
Conservation Chair

Kull, Kallie

Subject: Kull, Kallie
RE: Marin CNPS

From: Doreen Smith [mailto:dlsmith@lvha.net]
Sent: Monday, March 19, 2012 12:13 PM
To: evabuxton@sbcglobal.net; Kull, Kallie
Cc: Doreen L. Smith; carnelian@pacbell.net
Subject: Re: Marin CNPS :

Kalllie, Eva,

When Ruth Pratt was employed , I was her liaison with Marin DPW when rare plants were suspected to be in the way of drainage-correction problems.I can come out and check sites when necessary.

Those species of concern:

Pt. Reyes Bird's beak, Cordylanthus maritimus ssp. palustris is strictly a plant of saltmarshes, it's taxonomy has been updated to Chloropyron maritimum ssp. palustre.

Pale yellow tarplant/hayfield tarplant has had a significant taxonomic revison: what once was recognized as Hemizonia congesta ssp. leucophylla is now known to be H. congesta ssp. congesta .It has WHITE flowers (that may turn yellow in dried herbarium specimens) . It is fairly common in grassland in theTomales area but very rarely encountered otherwise in Marin County. The common grassland yellow tarplant, ONCE THOUGHT be H. congesta spp. congesta is NOW H. congesta ssp. lutescens and is NOT a species of concern.

Marsh microseris, Microseris paludosa, so far seems to be extiripated from all historic locations except on Pt. Reyes Peninsula. It grows in seasonally moist grassland swales

Marin knotweed, Polygonum marinense, grows at the high tideline with pickleweed, Salicornia pacifica, in saline and brackish marshes .

Doreen Smith (Rare Plant information co-ordiantor, Marin Chapter CNPS.

Kallie,

Thanks for your information. I'm not quite sure why you contacted the CNPS unless the Flood Control district has been asked to do so in the past. It appears that your maintenance will take place on disturbed land. It's not possible for me to determine if the four plants listed in the documents (Point Reyes bird's beak, hayfield tarplant, marsh microseris, Marinknotweed) have been found on the sites in the past.

Below is a portion from Marin County Flood Control - RMA Program Supporting Documents - basis for the Neg Dec
(4.4; PLA-2; p. 32-33)

"If suitable habitat is determined to be present within the maintenance site, botanical surveys should be conducted before activities commence to determine whether any special status plant species are present. Rare plant surveys, if necessary, should be conducted following the Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities (CDFG 2009b) and Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed and Candidate Plants (U.S.

Fish and Wildlife Service 2000).
Surveys should be conducted in the field when species are both evident and identifiable, normally during flowering or fruiting. Multiple visits to a site may be necessary to capture floristic diversity present at the site.
If listed species are observed or presumed present, then the ECC should take such action as is necessary to protect the plants, using fencing, buffers, etc. If possible and practicable, the project should be redesigned to avoid listed plant species.
Marin County Flood Control and Water Conservation District / RMA Program 33
For all observed special status species, the ECC should complete and submit a California Native Species (or Community) Field Survey Form to the CNDDB documenting the species and location."

I'm assuming that the Flood Control district will be doing surveys and follow the protocol outlined in documents.

Please let me know more specifically what you might expect the CNPS to do.

Eva

Kull, Kallie

›m: Kull, Kallie
Sent: Friday, March 16, 2012 3:45 PM
To: 'mwilliams@lgvsd.org'
Cc: Williams, Laurie; Taylor, Tammy
Subject: Routine Maintenance Activities- Miller and Gallinas Creeks
Attachments: AppendixA_RMA_Master_List_Project_Sites.pdf; AppendixB_RMA_Sediment_Removal_Sites.pdf

Hi Mark-

I received your request (below) from our planning department and am forwarding you the main spreadsheets that describe the types of Flood Control Routine Maintenance activities within the Miller and Gallinas Creek watersheds. When viewing the main list entitled Appendix A Master List, you can scroll down to find the activities listed for Gallinas Creek under Flood Zone 7 and activities for Miller Creek at the very bottom of the page under CSA 13 (Community Service Area).

The second spreadsheet lists the sediment removal sites Zone 7 where Gallinas Creek is located. There are no proposed sediment removal sites in Miller Creek CSA 13 area.

Please let me know if you need anything else to review the CEQA document on this project-

Kallie Kull
Marin County Flood Control and Water Conservation District
473-6532

From: Mark Williams [mailto:mwilliams@lgvsd.org]
Sent: Thursday, March 15, 2012 1:17 PM
To: EnvPlanning,
Cc: Susan McGuire
Subject: Routine Maintenance Activities Draft Negative Declaration

Could you please provide the specific locations and activities to be performed regarding the Miller Creek and Gallinas Creek routine maintenance activities outlined in your notice of availability?

Thank you,

Mark R. Williams
General Manager
Las Gallinas Valley Sanitary District
300 Smith Ranch Road
San Rafael, CA 94903
Phone 415-472-1734
Fax 415-499-7715

Other

(did not go to DFCS
unless in previous

NEGATIVE DECLARATION

Marin County
Environmental Coordination and Review

Pursuant to Section 21000 et. seq. of the Public Resources Code and the Marin County Environmental Impact Review Guidelines and Procedures, a Negative Declaration is hereby granted for the following project.

1. **Project Name:** **Marin County Flood Control Routine Maintenance Activities Program**

2. **Location and Description:** **Eastern Marin County Flood Control Zones 1, 3, 4, 7, 9, and Community Service Area 13 in Upper Lucas Valley**

The Marin County Flood Control and Water Conservation District's (MCFCWCD) Routine Maintenance Activities (RMA) program defines the scope and timing of the maintenance activities conducted annually in and around flood control channels and facilities in East Marin County. The MCFCWCD is responsible for maintenance of 37 miles of stream channels, two sediment basins, and numerous flood control facilities throughout East Marin County (e.g. weirs, tide gates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, culverts, outfalls, storm drains and pump station inlet/outlet structures). The RMA program covers five types of routine flood control maintenance activities: 1) Vegetation management; 2) Sediment and debris removal; 3) Erosion control; 4) Maintenance and repair of flood control structures; and 5) Levee maintenance. The primary purpose of the program is to reduce the potential risk of flooding and associated damage to adjacent properties and infrastructure such as bridges, culverts, roads and flood control facilities. The RMA program does not include projects requiring individual agency permits, such as larger capital improvement projects (e.g. building a new pump station), large dredging projects (e.g. dredging the mainstem of Novato Creek), or new bank stabilization projects using only hardened materials such as rock rip rap. The RMA program establishes programmatic guidance to conduct these maintenance activities for flood control purposes while avoiding and minimizing environmental impacts. The program provides the organizational framework to ensure that routine maintenance work complies with the terms of State and Federal regulations and permit conditions to protect water quality, wetlands and riparian habitats.

3. **Project Sponsor:** **Marin County Flood Control and Water Conservation District**

4. **Finding:** **Based on the attached Initial Study and without a public hearing, it is my judgment that:**

☐ The project will not have a significant effect on the environment.

☒ The significant effects of the project noted in the Initial Study attached have been mitigated by modifications to the project so that the potential adverse effects are reduced to a point where no significant effects would occur.

Rachel Warner
Marin County Environmental Coordinator

Date: 2/14/12

Based on the attached Initial Study and the comments received during the public review period, the Marin County Department of Public Works grants a Negative Declaration.

_____ _____ Date: _____
Robert Beaumont, ctor
Marin County Flood Control and Water Conservation District

5. Mitigation Measures:

(Select one of the following statements)

☐ The Initial Study did not identify any potential adverse impacts and, therefore, the project does not require mitigation measures.

☒ Please refer to mitigation measures in the attached Initial Study.

☐ The Initial Study concludes that the Department can modify the project's potential adverse impacts, as noted under the following factors in the attached Initial Study.

The Department of Public Works has incorporated into the project all of the mitigation measures described in the attached Initial Study.

6. Preparation:

The Marin County Flood Control and Water Conservation District prepared this Negative Declaration and interested parties may obtain copies at the address listed below.

Kallie Kull, Senior Planner
Marin County Department of Public Works
3501 Civic Center Drive, Room 304
San Rafael, CA 94903

Monday through Friday
8:30 a.m. to 4:30 p.m.
Telephone (415) 473-6528

MARIN COUNTY FLOOD CONTROL AND WATER CONSERVATION DISTRICT

DRAFT INITIAL STUDY

Marin County Flood Control District
Routine Maintenance Activities Program

I. BACKGROUND

A. Project Sponsor's Name and Address: Marin County Flood Control District
3501 Civic Center Drive, Room 304
San Rafael, CA 94903

B. Lead Agency Name and Address: Marin County Flood Control District
3501 Civic Center Drive, Room 304
San Rafael, CA 94913-4186

C. Contact Person and Phone Number: Kallie Kull; Senior Planner, (415) 499-6532

II. PROJECT DESCRIPTION

A. Project Title: Marin County Flood Control District: Routine Maintenance Activities Program (RMA)

B. Type of Application(s): Flood Control Routine Maintenance Projects

C. Project Location: The geographic extent of the RMA program includes routine maintenance activities carried out in and around creeks, channels, ditches, levees, flood control structures and facilities, located within six project areas: one each for five flood control zones in East Marin County (Zones 1,3,4,7,9), and County Service Area 13 in Upper Lucas Valley (See Figure 1):

Flood Control Zone 1 – Novato
Flood Control Zone 3 – Richardson Bay
Flood Control Zone 4 – Bel Aire and Strawberry Circle
Flood Control Zone 7 – Santa Venetia
Flood Control Zone 9 – Ross Valley
County Service Area 13 – Upper Lucas Valley

Refer to:
Figure 1: Map of County Flood Control Zones and CSA/CSD areas included in the project
Attachment A: Maps 1-12 of Project Areas and Species of Concern
Attachment B: Master list of Project Areas and RMA Activities
Attachment C: Master List of all Sediment Removal Sites

D. General Plan Designation: The proposed project area is vast in extent and includes creeks which are located within the mapped City Centered and Coastal Baylands Corridors of East Marin (Countywide Plan 2007) and within Streamside Conservation Areas (SCAs).

E. Zoning: Project areas within the RMA program fall into the land use and zoning categories of Residential, General Commercial/Mixed Use, Office/Commercial Mixed Use, Neighborhood/Commercial Mixed- Use/ Recreational Commercial, Industrial, Agricultural, Public and Open Space Lands.

PROJECT AREA

The Marin County Flood Control District is responsible for maintenance of 37 miles of stream channels, two sediment basins, and numerous flood control facilities (e.g. weirs, tide gates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, culverts, outfalls, storm drains and pump station inlet/outlet structures), throughout East Marin County. The geographic extent of the proposed Routine Maintenance Program (RMA) includes six project areas: one each for five flood control zones (Zones 1, 3, 4, 7 and 9), and one project site in County Service Area 13 in Upper Lucas Valley (*Figure 1*). The Flood Control Zones included in this project are located exclusively in Eastern Marin County. Each zone includes a number of project sites, which are differentiated based on stream reaches and habitat types. In all, there are 93 specific sites where the District performs routine maintenance activities. There are 26 project sites located in Flood Control Zone 1 in the Novato Creek watershed, 33 project sites in Flood Control Zone 3 in Mill Valley, six project sites in Flood Control Zone 4 in Bel Aire/Strawberry, 13 project sites in Flood Control 7 in Santa Venetia, 14 project sites in Flood Control Zone 9 in the Corte Madera Creek watershed, and one project site in County Service Area 13 in Upper Lucas Valley.

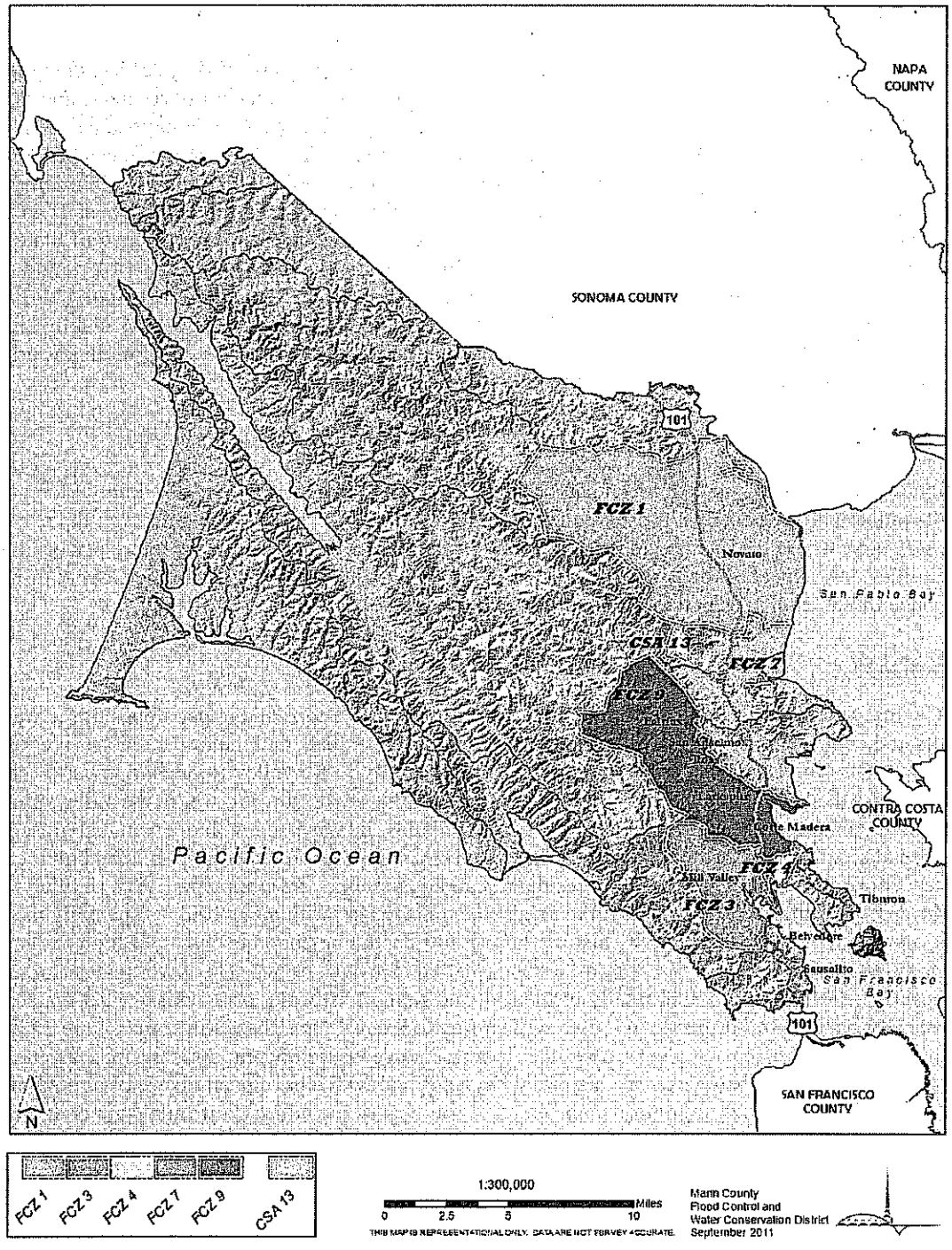

Figure 1. Project areas covered by the Marin County Flood Control District's Routine Maintenance Activities Program; Flood Control Zones 1, 3, 4, 7, 9, and Community Service Area 13 in Upper Lucas Valley, all in East Marin County.

PROGRAM OVERVIEW

Program Purpose

The Marin County Flood Control District's Routine Maintenance Activities Program (RMA) defines the types and scope of the District's annual routine maintenance activities conducted in and around flood control channels and facilities. The primary purpose of the program is to reduce the potential risk of flooding and associated damage to adjacent properties and infrastructure such as bridges, culverts, roads and flood control facilities. The RMA program establishes programmatic guidance to conduct these activities for flood control purposes while avoiding and minimizing environmental impacts. The RMA program provides the organizational framework for flood control staff and managers to oversee maintenance crews and their activities and to ensure that their work complies with the terms of State and Federal regulations and permit conditions to protect water quality, wetlands and riparian habitats. The RMA program does not include projects requiring individual agency permits, such as larger capital improvement projects (e.g. building a new pump station), large dredging projects (e.g. dredging the mainstem of Novato Creek), or new bank stabilization projects using only hardened materials such as rock rip rap. The District will implement the RMA program in a yearly work cycle, to include pre-project notification, project implementation, and annual reporting.

Jurisdictional Boundaries

Maintenance activities are implemented on an annual basis only in locations where the Marin County Flood Control District and/or its municipal partners own the land outright in fee title or holds legal easements; with the exception of four sites on private property, where the District annually receives written landowner permission before performing maintenance activities. No aspect of the RMA program shall be implemented in areas where the County or its municipal partners do not have direct legal jurisdiction or landowner permission.

Environmental Setting

Eastern Marin County watersheds share the same general anatomy: the ridge-tops and upper slopes of the watersheds are in generally protected open space areas, the valley floors are densely developed, and the lower reaches are tidally-influenced and quite flat. The District's 93 RMA sites are located mainly in the valley floors and lower creek reaches. The uplands encompass the hilly, often steep, terrain from the top of the ridges down to where the valleys flatten out. They are dominated by mixed evergreen forest and oak-bay woodlands, interspersed with open annual grasslands, chaparral, and coastal scrub. Much of the upland habitats in Marin County are protected as public and municipal open space. The valley floors are developed with dense residential and commercial developments, often right up to, and sometimes in, the creek channels. The road network can also be quite dense, with many bridges spanning the creeks. In almost all cases, creeks are heavily impacted by historic human use, including concrete channelization and straightening, constrained riparian corridors, impacted floodplains, and non-native invasive species. The lower reaches of creeks have very little topographic relief, they are either tidally influenced and support saltwater or brackish-water marsh, or are protected by levees for agricultural or residential use. While often less developed, these lower marsh areas have altered hydrology and are constrained by roads, levees, and other human-induced development. Freshwater seasonal wetlands have become established in areas that were once historical baylands and which have been diked for agriculture. These seasonal wetlands provide habitat for migratory waterfowl and shorebirds, including California clapper and black rails.

Scope of Work

The RMA program covers five categories of routine flood control maintenance activities:

1) Vegetation management
2) Sediment and debris removal
3) Erosion control
4) Maintenance and repair of flood control structures
5) Levee maintenance

1) Vegetation Management Activities are employed to achieve three main goals:

- maintain channel function
- reduce fire fuels,
- restore creek habitat

These goals are achieved by removing invasive non-native plants and re-vegetating with native plants where necessary to control erosion and maintain riparian habitat. Channel maintenance is achieved by limbing and trimming of riparian trees and shrubs, selective cattail cutting and removing trash. Occasionally trees growing on the channel bed need to be removed because they obstruct flow or divert flow and cause bank erosion. This work is typically limited to the removal of arroyo willow or white alder growing in the center of the channel bed.

Vegetation management activities are performed by crews using hand tools and do not include ground-disturbing activities. Cattails are removed from selected reaches as part of sediment removal activities. All vegetation maintenance is done without the use of herbicides.

Vegetation management takes place from the channel bottom to the top of the high water mark, and includes trimming limbs from trees and shrubs growing over the channel and trimming branches that hang down into the active channel. The goal of vegetation management within natural channels is to establish a canopy cover that will suppress invasive plant growth and maintain cooler stream temperatures.

Fire fuel reduction is achieved by mowing on tops of banks and levees and the thinning and removal of non-native species such as ivy and Himalayan blackberry. For mowing, crews use weed-eaters for smaller areas and tractors with mowing attachments for larger, more open areas.

Tree removal is a rare event with the exception of non-native trees such as acacia. Once or twice a year crews may need to remove a tree that has died and poses a hazard to adjacent structures or could pose a flood hazard if it falls into the channel. Removal of these trees is conducted in consultation with the Department of Fish and Game.

Removal of non-native vegetation takes place as part of maintaining channel function but also occurs in a more strictly restoration-type activity led by Point Reyes Bird Observatory's STRAW Program (Students and Teachers Restoring a Watershed) in partnership with the Marin County Stormwater Pollution Prevention Program (MCSTOPPP). Students working in the STRAW Program remove invasive non-natives and replant sites with native vegetation. The program has worked at creek sites near schools where access and proximity allow for the removal of all traces of the non-native vegetation and the return to sites to continue maintenance and restoration of the creek corridor. These restoration activities have been ongoing for over 10 years. The partnership with the STRAW Program demonstrates the County's efforts to manage creeks through stewardship of the land. Native plant restoration reduces the maintenance needs in these creeks and allows for better habitat to be established in the urban creek corridors. The students, teachers and parents working in their local creeks increases the community awareness of the habitat and supports the County's watershed-based approach to caring for our creeks.

2) Sediment and Debris Removal

Sediment and debris removal from channels, sediment basins and around flood control facilities (e.g. trash racks) is completed on a routine basis in order to maintain channel function and facilitate unobstructed flow around structures including bridges, storm drain outlets, and pump stations. Excavated sediment is hauled away to a permitted spoils disposal site. Debris items found in the channels and around flood control facilities (e.g. tires, shopping carts, trash, furniture), are typically removed by hand and hauled to a certified disposal site, such as a landfill. Attachment B lists all sediment removal sites included in the RMA program with specific information regarding dimensions of work area, equipment used, location of equipment, and expected duration of work at each site.

3) Erosion Control

Erosion control activities take place only where the District and/or its partners hold fee title to the land. Most large erosion control and large bank stabilization projects are not routine and therefore are not included in the RMA program. The only erosion control projects included in the RMA program are those where a failing streambank is composed of earthen materials and biotechnical engineering techniques are used to stabilize the bank and prevent further erosion (e.g. brush mattresses and willow walls). Erosion control activities will generally be minor in nature and completed in 2-4 days.

4) Maintenance and Repair of Flood Control Structures

Annual routine maintenance and repair of Marin County flood control structures is a key objective of the RMA program. Flood control structures are defined to include all structures built or maintained by the District, including, but not limited to, weirs, tide gates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, culverts, outfalls, storm drain or pump station inlet/outlet structures and similar structures. The maintenance, repair or rehabilitation of flood control structures does not exceed 100 linear feet upstream or downstream of each structure and does not include increasing the footprint of any structure.

5) Levee Maintenance and Repair

Levee maintenance includes mowing levee tops and banks above the high water line for fire fuel reduction, stabilizing levees by placing fill on the levee tops, and controlling burrowing rodent populations. Levee stabilization may occur on any levee maintained by the District; a landowner access agreement is required for activities at site 7-GAL on the Santa Venetia levee, which is private property. If a gopher infestation occurs, the gophers are trapped and their burrows are filled with an earth/concrete mix or bentonite, following FEMA guidelines. The County of Marin does not use rodenticides or other poisons in rodent control for levee maintenance or in any other RMA program activity.

PROGRAM IMPLEMENTATION

Environmental Staff and Oversight

The Marin County Flood Control District will designate environmental staff who will provide day-to-day oversight of the RMA program including: 1) pre-project planning and notification to applicable resource agencies, 2) pre-project surveys for special status wildlife and plant species depending on site location and designated work windows, 3) project implementation including site surveys, conducting crew trainings, and coordinating with crews in the field, and 4) annual reporting to permitting resource agencies. The District will designate Environmental Compliance Coordinators (ECCs) to specifically oversee the biological aspects of the RMA program. The ECCs shall have an understanding of biological resources, permit regulations that may affect listed species and/or water quality, familiarity with the maintenance activities, and how to implement Avoidance and Minimization Measures and BMPs in the field. The ECCs will coordinate activities with input and review from County of Marin Public Works' staff biologists.

A Biological Assessment (BA) was completed for the RMA program in June 2011, which addresses the project's potential

impacts to water quality, wildlife and sensitive native habitats. Based on the findings in the BA, the RMA program specifies appropriate General and Activity-specific Conditions, and species-specific Avoidance and Minimization Measures (AMMs) to be employed at each project site and for each type of maintenance activity. Program implementation also includes employment of existing Best Management Practices (BMPs) from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and the Federal Emergency Management Agency (FEMA).

General and activity-specific conditions, AMMs and BMPs are incorporated into the overall project description and spelled out in the individual project fact sheets for each site. The job of the ECCs is to ensure that all measures are employed as prescribed in the field, depending on the location and nature of the activity.

Schedule and Timing of Maintenance Activities

The Routine Maintenance Activities Program is implemented annually throughout the project area in East Marin County. The general work window for RMA activities is the dry season, from April 15th to October 15th, depending on weather. Dry years may mean a longer work season; wet weather may halt the work season early. Table 1 below shows the Special Status Species potentially found within the project area and the established work windows for each species relative to the proposed work periods. As a general rule, work at each site will be scheduled around relevant work windows to avoid impacts. In instances where work needs to be scheduled outside of an established work window for a particular species in a specific location, species-specific pre-construction surveys will be conducted before maintenance activities commence. Work at a site may be re-scheduled based on survey findings, and/or may require application of Avoidance and Minimization Measures before proceeding. In all cases, all routine maintenance activities shall be conducted in such a way as to avoid and/or minimize environmental impacts to special status species, sensitive habitats, and water quality.

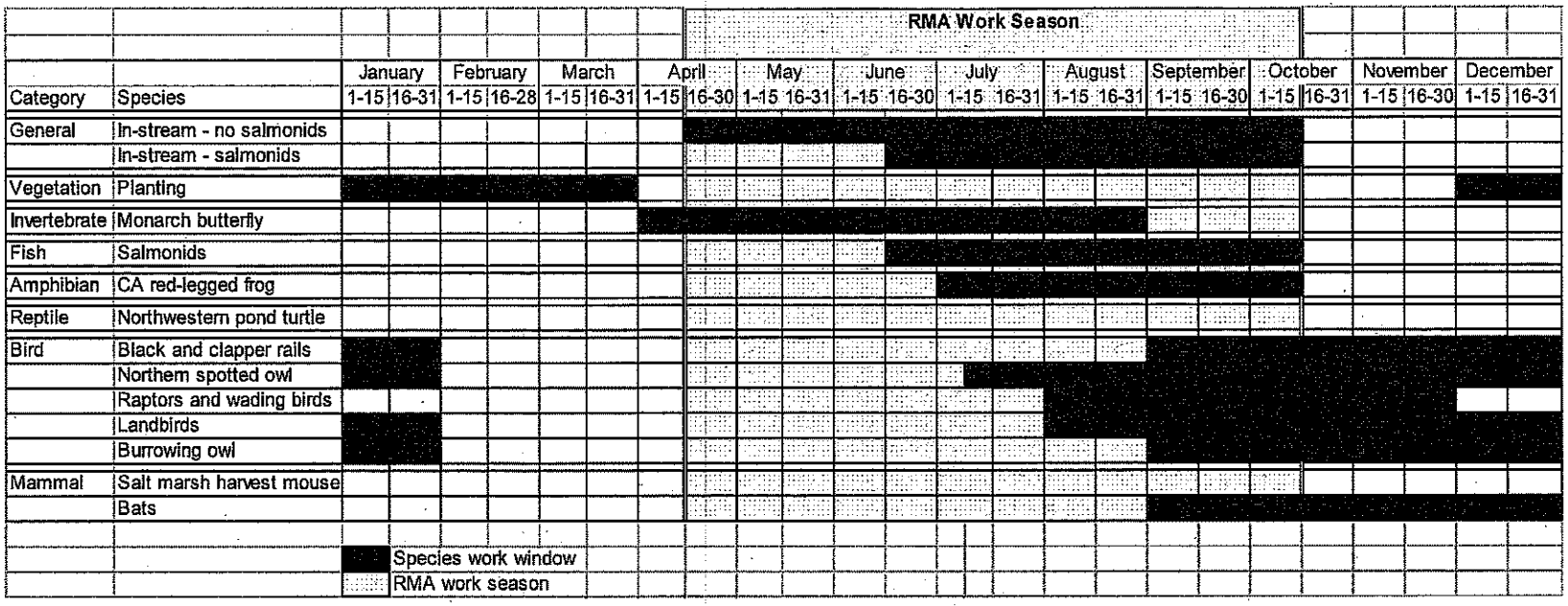

Table 1. Environmental Work Window for Special Status Species relative to the work season for implementation of the RMA Program.

Responsible Parties and Program Partners

Marin County Flood Control and Water Conservation District (District)- The Marin County Flood Control and Water Conservation District is the primary proponent for the RMA program, which utilizes the labor and expertise of the County of Marin Department of Public Works (DPW), County road maintenance crews, Conservation Corps North Bay crews (CCNB), and private contractors to manage and implement routine maintenance activities. The Marin County Flood Control and Water Conservation District (District) was formed in 1955 by an act of the California State Legislature with the primary purpose of controlling flood and storm waters of streams which flow within and into the county. The Marin County Board of Supervisors sits as its board and the District is staffed by the County of Marin Department of Public Works (DPW). The boundaries of the District are contiguous with those of the county and eight flood control zones have been established to address specific issues related to flooding within individual watersheds.

County of Marin Department of Public Works Road Crew (DPW)- DPW road maintenance crews perform a portion of the vegetation management, sediment removal, erosion control, and facility maintenance activities.

Marin County Parks - *The District coordinates with Marin County Parks to perform vegetation maintenance activities on certain lands under their jurisdiction.*

Conservation Corps North Bay (CCNB)- Conservation Corps North Bay is a non-profit job training and educational organization which has been operating in Marin County since 1982. CCNB will be the primary active partner and contractor with the District for many of the activities included in the RMA program. CCNB Maintenance Supervisors and staff will be trained annually by the District staff to incorporate the general and activity-specific conditions, AMMs, and BMPs required for each activity at each site in order to protect water quality, habitat and special status species.

Municipal Partners- Cities of Mill Valley, Novato, Larkspur, Ross, Fairfax, and San Anselmo- In addition to the work it oversees directly on County unincorporated lands, the District has a formal agreement with the City of Mill Valley that enables the City of Mill Valley to perform routine flood control maintenance activities on an annual basis on properties that fall within the District's flood control easements. In Novato, the District performs flood control maintenance activities in areas within the City of Novato's jurisdiction. The District is currently negotiating similar agreements for the District to conduct maintenance activities on a routine basis within the smaller municipalities of the Ross Valley (Cities of Larkspur, Ross, San Anselmo and Fairfax.

MCSTOPPP and STRAW- The District partners with the Marin County Stormwater Pollution Prevention Program (MCSTOPPP) and the Point Reyes Bird Observatory's (PRBO) Students and Teachers Restoring a Watershed (STRAW) to perform restoration work in eastern Marin County. Activities consist primarily of removal of invasive plants and planting of native species by groups of teachers and students organized by STRAW.

Private Contractors - District environmental staff will work with outside contractors prior to implementing activities covered by the RMA. The ECC will be responsible for making sure that hired contractors understand what materials they need to have in hand and what methods to employ when implementing prescribed AMM's and BMPs during and post-construction. Companies contracting with the County of Marin for RMA program activities will be held to standards described in the Specifications that are included in their County contracts.

Foundation Documents for the RMA

The RMA program is largely based on program documents and studies previously developed by the Bay Area Stormwater Management Agencies Association (BASMAA). The District, as a member of MCSTOPPP, has been an active member of BASMAA since 1989. BASMAA is a consortium of 90 Bay Area county and city governments, local water and sanitation districts, and state agencies and was formed in response to the National Pollutant Discharge Elimination System (NPDES) permitting program to promote regional consistency. In 1998, BASMAA formed an Operational Permit Committee (OPC) which worked for several years to develop a Regional General Permit with the USACE to cover routine maintenance activities in flood control channels within BASMAA's jurisdictional areas. Although a Regional General Permit was not obtained, the OPC produced several documents which have been used by several BASMAA members to obtain individual permits. In addition to previous documents developed for BASMAA, the District commissioned a Biologic Assessment for the RMA program. Biological Assessment for Routine Flood Control Maintenance Activities; Marin County, California (July 2011).

The District is utilizing the information in these documents to support programmatic permit applications to the Department of Fish and Game, the Army Corps of Engineers, and the Regional Water Quality Control Board for the RMA program.

- Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Public Works. July 2011.
- Minimal Threat Channel and Basin Maintenance Activities. October 2009. This document describes routine flood control maintenance activities.
- Minimal Threat Flood Control Routine Maintenance Activities: Regional Biological Assessment. October 2006. This document describes the environmental setting, special status species within the BASMAA jurisdictional area, the extent and scope of proposed activities, and a suite of AMMs and BMPs.
- Flood Control Facility Maintenance Best Management Practices: A Manual for Minimizing Environmental Impacts from Stream and Channel Maintenance Activities. June 2000. The manual describes BMPs for equipment and vehicles, sediment control, soil stabilization, natural resource protection and restoration, vegetation and debris management, and water diversions.

III. CIRCULATION AND REVIEW

A. Responsible Agencies: *(agencies whose approval is required and permits needed)*

- U.S. Army Corps of Engineers – Section 404 permit under the Clean Water Act with consultation from the U.S. Fish and Wildlife Service (Endangered Species Act of 1973, as amended) and NOAA Fisheries (Endangered Species Act of 1973, as amended);
- San Francisco Bay Regional Water Quality Control Board – Section 401 Water Quality Certification; and
- California Department of Fish and Game - 1600 Streambed Alteration Agreement Programmatic Routine Maintenance Agreement.

DOCUMENTS INCORPORATED BY REFERENCE

The following is a list of relevant information sources, which have been incorporated by reference into the foregoing Initial Study pursuant to Section 15150 of the State CEQA Guidelines. The number assigned to each information source corresponds to the number listed in parenthesis following the incorporating topical question of the Initial Study checklist. These documents are both a matter of public record and available for public inspection at the County of Marin. Copies of Documents (1-2) below are available for public review at the County of Marin Planning Department (Room 308), 3501 Civic Center Drive, San Rafael, California, Monday through Friday between the hours of 8:00 a.m. to 4:00 p.m. Copies of documents (3-8) are available for public review at the Marin County Public Works Department (Room 304) or at the Marin County website www.marinwatersheds.org. Copies of Documents (9 – 10)) can be found on-line at the individual municipal websites.

1) Marin Countywide Plan, Marin County Community Development Agency, Planning Division (2007).

2) Marin County Code; Supp. No. 6-11, Update 1; (June 7, 2011).

3) A Programmatic Approach to Routine Flood Control Maintenance Activities; County of Marin (October 2011).

4) Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Public Works. (October 2011).

5) Minimal Threat Channel and Basin Maintenance Activities. BASMAA OPC (October 2009).

6) Minimal Threat Flood Control Routine Maintenance Activities: Regional Biological Assessment. BASMAA OPC October 2006.

7) Flood Control Facility Maintenance Best Management Practices: A Manual for Minimizing Environmental Impacts from Stream and Channel Maintenance Activities. BASMAA OPC, (June 2000).

8) County Road Maintenance Guidelines for Protecting Aquatic Habitat and Salmon Fisheries; FishNet 4C; Dec 2004; updated 2007)

9) City of Mill Valley General Plan (1989).

10) City of Novato General Plan (1996).

IV. EVALUATION OF ENVIRONMENTAL IMPACTS AND MITIGATION MEASURES

Pursuant to Section 15063 of the State CEQA Guidelines, and the County EIR Guidelines, Marin County will prepare an Initial Study for all projects not categorically exempt from the requirements of CEQA. The Initial Study evaluation is a preliminary analysis of a project which provides the County with information to use as the basis for deciding whether to prepare an Environmental Impact Report (EIR) or Negative Declaration. The points enumerated below describe the primary procedural steps undertaken by the County in completing an Initial Study checklist evaluation and, in particular, the manner in which significant environmental effects of the project are made and recorded.

A. The determination of significant environmental effect is to be based on substantial evidence contained in the administrative record and the County's environmental database consisting of factual information regarding environmental resources and environmental goals and policies relevant to Marin County. As a procedural

device for reducing the size of the Initial Study document, relevant information sources cited and discussed in topical sections of the checklist evaluation are incorporated by reference into the checklist (e.g. general plans, zoning ordinances). Each of these information sources has been assigned a number which is shown in parenthesis following each topical question and which corresponds to a number on the data base source list provided herein as Attachment A. See the sample question below. Other sources used or individuals contacted may also be cited in the discussion of topical issues where appropriate.

B. In general, a Negative Declaration shall be prepared for a project subject to CEQA when either the Initial Study demonstrates that there is no substantial evidence that the project may have one or more significant effects on the environment. A Negative Declaration shall also be prepared if the Initial Study identifies potentially significant effects, but revisions to the project made by or agreed to by the applicant prior to release of the Negative Declaration for public review would avoid or reduce such effects to a level of less than significance, and there is no substantial evidence before the Lead County Department that the project as revised will have a significant effect on the environment. A signature block is provided in Section VII of this Initial Study to verify that the project sponsor has agreed to incorporate mitigation measures into the project in conformance with this requirement.

C. All answers to the topical questions must take into account the whole of the action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts. Significant unavoidable cumulative impacts shall be identified in Section VI of this Initial Study (Mandatory Findings of Significance).

D. A brief explanation shall be given for all answers except "Not Applicable" answers that are adequately supported by the information sources the Lead County Department cites in the parenthesis following each question. A "Not Applicable" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g. the project falls outside a fault rupture zone). A "Not Applicable" answer shall be discussed where it is based on project-specific factors as well as general standards (e.g. the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).

E. "Less-than-significant Impact" is appropriate if an effect is found to be less-than-significant based on the project as proposed and without the incorporation of mitigation measures recommended in the Initial Study.

F. "Potentially Significant Unless Mitigated" applies where the incorporation of recommended mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less-than-significant Impact." The Lead County Department must describe the mitigation measures, and briefly explain how they reduce the effect to a less-than-significant level (mitigation measures from Section V, "Earlier Analyses", may be cross-referenced).

F. "Significant Impact" is appropriate if an effect is significant or potentially significant, or if the Lead County Department lacks information to make a finding that the effect is less-than-significant. If there are one or more effects which have been determined to be significant and unavoidable, an EIR shall be required for the project.

G. The answers in this checklist have also considered the current California Environmental Quality Act Guidelines and the Initial Study Checklist contained in those Guidelines.

H. This Initial Study checklist was prepared consistent with current California Environmental Quality Act Guidelines and the Initial Study checklist contained in those Guidelines.

V. ISSUES *(for source #(s) see: Documents Included by Reference; Page 13)*

1. **LAND USE AND PLANNING.** ***Would the proposal:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Conflict with applicable Countywide Plan designation or zoning standards? (source #(s): 1, 2)	[ ]	[ ]	[X]	[ ]

The determinations of policy consistency as discussed in this Initial Study section represent County staff interpretation of policies. However, this Initial Study does not determine policy consistency. The County decision-makers make the formal policy consistency determinations.

Section 15358(b) of the CEQA Guidelines states that "effects analyzed under CEQA must be related to a physical change in the environment", however policy inconsistencies may not necessarily indicate significant environmental effects Therefore, only those policy inconsistencies that would lead to a significant effect on the physical environment are considered significant impacts pursuant to CEQA. Where potentially significant environmental impacts are raised in the discussion below, they have been mitigated to a less-than-significant impact and, therefore, project activities are determined to be consistent with the relevant policies cited. Mitigations are addressed further in the topical impact sections following the plan, policies and regulations analyses.

LOCAL PLANS, POLICIES, AND REGULATIONS

Land use designations and development of the project sites are governed by the objectives and policies of the 2007 Marin Countywide Plan (CWP), sections of the Marin County Code, including Title 22 (Zoning) and Title 23 (Natural Resources) and Title 24 (Development Standards). And General Plans for local municipal program partners including; City of Novato, City of Mill Valley, Town of Ross, City of Larkspur, Town of San Anselmo and the Town of Fairfax.

MARIN COUNTY CODE

TITLE 22- DEVELOPMENT CODE; Chapter 22.27- Native Tree Protection and Preservation

Section 22.27.040 (k)- Exemption to the Prohibition of Removal of a Protected Tree states that the project proponent must demonstrate that the tree removal is by a public agency to provide for the routine management and maintenance of public land.

Consistent- The project is consistent with the Marin County Code (Title 22) which requires projects to minimize tree removal and grading, as well as to maintain adequate site features that establish the visual character of the site. Marin County Flood Control District during RMA Program implementation, will minimize any riparian tree removal unless absolutely necessary to achieve the goals of the program, which are to protect the public and public facilities from flooding, while protecting water quality and sensitive habitats. To protect sites that are environmentally sensitive, the District will employ a suite of Avoidance and Minimization Measures and Best Management Practices to protect existing habitats and species of concern. Therefore, the project is consistent with the development standards set forth in Title 22.

TITLE 23- NATURAL RESOURCES;

The provisions of Title 23 are enacted to protect and promote the public health, safety and general welfare, to preserve environmental qualities, and to protect the value, worth and enjoyment of the use of real property to the fullest extent possible, through the regulation of the uses or activities of the property in a manner which will prevent serious public injury.

Chapter 23.08 Excavating, Grading, and Filling
Chapter 23.08 establishes regulations for excavation, grading and filling in order to:

(1) Preserve and enhance the natural beauties of the land, streams, bays and shorelines;
(2) Reduce or eliminate the hazards of earth slides, mudflows, rock falls, undue settlement, erosion, siltation, sedimentation and flooding;
(3) Protect and enhance the water quality of watercourses, water bodies and wetlands and vegetation for wildlife habitat;
(4) Regulate de facto development caused by uncontrolled grading.

Activities of this nature which are considered exempt from the provisions of this chapter include:
(a) Grading done by or on behalf of a public agency that assumes full responsibility for the work.

Consistent: The project as described will be implemented by the County of Marin Flood Control District, local municipalities or private contractors under contract with the District. The District is a public agency and assumes full responsibility for the work conducted under the RMA program, therefore the program is exempt from the terms of Chapter 23.08, and consistent with the requirements of this section of County code.

Chapter 23.09 Floodplain Management
It is the purpose of Chapter 23.09 to promote the public health, safety and general welfare and to minimize the losses described in this section by provisions designed to:

(A) Protect human life and health;
(B) Minimize expenditure of public money for flood control projects;
(C) Minimize the need for rescue and relief efforts associated with flooding and generally undertaken at the expense of the general public;
(D) Minimize prolonged business interruptions;
(E) Minimize damage to public facilities and utilities, such as water located in areas of special flood hazard;
(F) Help maintain a stable tax base by providing for the second use and development of areas of special flood hazard so as to minimize future flood blight areas;
(G) Ensure that potential buyers are notified that property is in an area of special flood hazard; and
(H) Ensure that those who occupy the areas of special flood hazard assume responsibility for their actions.

(2) In order to accomplish its purposes, Chapter 23.09 includes methods and provisions for:

(A) Restricting uses which are dangerous to health, safety and property due to water or erosion hazards, or which result in damaging increases in erosion or in flood heights or velocities;
(B) Requiring that uses vulnerable to flood, including facilities which serve such uses, be protected against flood damage at the time of initial construction;
(C) Controlling the alteration of natural floodplains, stream channels, and natural protective barriers, which help accommodate or channel floodwaters;
(D) Controlling filling, grading, dredging and other development which may increase flood damage; and
(E) Preventing or regulating the construction of flood barriers which will unnaturally divert floodwaters or which may increase flood hazards in other areas.

Consistent- The project is consistent with the Marin County Code Title 23 which was enacted to protect and promote the public health, safety and general welfare, and to preserve environmental qualities in a manner which would prevent serious public injury. The objective of the project is to promote flood control and minimize risk to public health, safety and welfare. The program as designed will minimize potential impacts to sensitive habitats and will be designed to blend into the surrounding natural environment to the greatest extent feasible. The proposed flood control project incorporates practices which enhance the biological and visual character of the creek corridor. Although some trimming of riparian trees will occur to prevent flooding, the project will not alter the riparian character of the project sites. The implementation of the proposed program will respect the surrounding natural environment and return channel elevations to their previous condition prior to sedimentation.

In summary, the proposed project is maintenance in nature, and will not change the Land Use Designations at the project sites or conflict with zoning standards or the objectives of the above-mentioned code in any way; therefore, the project will be consistent with applicable Marin County Code.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Conflict with applicable environmental plans or policies adopted by Marin County? (source #(s): 1)	[ ]	[X]	[ ]	[ ]

MARIN COUNTYWIDE PLAN (2007)

Specific Countywide Plan policies which pertain to the proposed project are associated with the following subjects:

(1) Include Resource Preservation in Environmental Review;
- BIO- 2.1 Include Resources Protection in Environmental Review

(2) Coordinate with Trustee Agencies and Promote Early Consultation with Agencies;
- BIO-2.8 Coordinate with Trustee Agencies during environmental review when special-status species, sensitive natural communities, or wetlands may be affected.
- BIO-2.9 Promote early consultation with other agencies.

(3) Protection of Riparian Systems
- BIO-1.5 Promote Use of Native Plant Species

- BIO-1.7 Remove Invasive Exotic Plants
- BIO-1.8 Restrict Use of Herbicides, Insecticides, and Similar Materials
- BIO-4.6 Control Exotic Vegetation
- BIO-4.7 Protect Riparian Vegetation

(4) Protection of Stream Conservation Areas
- BIO- 4.4 Promote Natural Stream Channel Function
- BIO-4.5 Restore and Stabilize Stream Channels
- BIO-4.10 Promote Interagency Cooperation
- BIO-4.19 Maintain Channel Stability

(5) Species and Habitat Preservation
- BIO-1.1 Protect Wetlands, Habitat for Special -Status Species, Sensitive Natural Communities, and Important Wildlife Nursery Areas and Movement Corridors.
- BIO-1.3 Protect Woodlands, Forests, and Tree Resources
- BIO-2.4 Protect Wildlife Nursery Areas and Movement Corridors.
- BIO-2.5 Restrict Disturbance in Sensitive Habitat During Nesting Season
- BIO-2.7 Protect Sensitive Coastal Habitat.
- BIO-5.3 Leave Tidelands in the Natural State
- BIO-5.5 Protect Freshwater Habitats
- BIO-5.6 Use Flood Basins for Seasonal Habitat

(6) Protection of Watersheds and Water Quality
- WR-1.1 Protect Watersheds and Aquifer Recharge
- WR-2.3 Avoid Erosion and Sedimentation
- WR-2.4 Design County Facilities to Minimize Pollutant Input

(7) Avoidance of Environmental Hazards
- EH-2.1. Avoid Hazard Areas
- EH-3.2. Retain Natural Conditions
- EH-4.1. Limit Risks to Structures
- EH-4.2 Remove Hazardous Vegetation

(8) Protection of Air Quality
- AIR-2.0 Protection from Emissions
- AIR-5.0 Adaptation to Climate Change

(9) Minimize Noise Impacts;
- NO-1.3 Regulate Noise Generating Activities

(10) Protection of Visual Resources
- DES-4.1. Preserve Visual Quality

(11) Avoid Impacts to Historical Resources;
- HAR-1.3. Avoid Impacts to Historical Resources

CONSISTENCY OF PROJECT WITH EXISTING MARIN COUNTYWIDE PLAN POLICIES

(1) Include Resource Preservation in Environmental Review

BIO-2.1 Include Resource Preservation in Environmental Review *to assess the impact of proposed development on native species and habitat diversity, particularly special-status species, sensitive natural communities, wetlands, and important wildlife nursery areas and movement corridors. Require adequate mitigation measures for ensuring the protection of any sensitive resources and achieving "no net loss" of sensitive habitat acreage, values, and functions.*

Consistent: The Marin County Department of Public Works (DPW) developed a biological assessment for the RMA program which evaluated potential impacts to native species, habitat diversity and special-status species and natural communities (Biological Assessment for Routine Flood Control Maintenance Activities; July 2011). The objective of the biological assessment was to identify adequate measures to protect any sensitive resources and achieve "no net loss" of sensitive habitat acreage, values, and functions. Prescriptions contained in the Biological Assessment include species related Avoidance and Minimization Measures as well as Special Conditions and Best Management Practices to be employed during project implementation. The project is guided by these prescriptions from the Biological Assessment so therefore, the project will be consistent with Policy BIO-2.1.

(2) Coordinate with Trustee Agencies and Promote Early Consultation with Other Agencies

BIO-2.8 Coordinate with Trustee Agencies. *Consult with trustee agencies (the California Department of Fish and Game, U.S. Fish and Wildlife Service, National Oceanic and Atmospheric Administration (NOAA) Fisheries, U.S. Army Corps of Engineers, Environmental Protection Agency, Regional Water Quality Control Board, and Bay Conservation and Development Commission) during environmental review when special-status species, sensitive natural communities, or wetlands may be adversely affected.*

BIO-2.9 Promote Early Consultation with Other Agencies. *Require applicants to consult with all agencies with review authority for projects in areas supporting wetlands and special-status species at the outset of project planning.*

Consistent: DPW has coordinated the development and review of this project and its associated environmental documents with natural resource trustee agencies who require permits for the proposed work. Permitting agencies include the San Francisco Bay Regional Water Quality Control Board (SFBRWQCB), the California Department of Fish and Game for all sites. A select number of sites will need permits from the U.S. Army Corps of Engineers with consultation with U.S. Fish and Wildlife Service, and the National Marine Fisheries Service. Regulatory permit applications have been submitted to all these agencies. Project coordination with these regulatory agencies and notification to all interested parties and the general public will continue throughout the public review process. Therefore, the project is consistent with Policies BIO-2.8 and BIO-2.9.

(3) Protection of Riparian Systems

BIO-1.5 Promote Use of Native Plant Species. *Encourage use of a variety of native or compatible non-native, non-invasive plant species indigenous to the site vicinity as part of project landscaping to improve wildlife habitat values.*

BIO-1.7 Remove Invasive Exotic Plants. *Require the removal of invasive exotic specie, to the extent feasible, when considering applicable measures in discretionary permit approvals for development projects unrelated to agriculture, and include monitoring to prevent re-establishment in managed areas.*

BIO-1.8 Restrict Use of Herbicides, Insecticides, and Similar Materials. *Encourage the use of integrated pest management and organic practices to manage pest with the least possible hazard to the environment. Restrict the use of insecticide, herbicides, or any toxic chemical substance in sensitive habitats, except when an emergency has been declared; the habitat itself is threatened; a substantial risk to public health and safety exists, including maintenance for flood control; or such use is authorized pursuant to a permit issues by the agricultural commissioner. Encourage non-toxic strategies for pest control, such as habitat management using physical and biological control, as an alternative to chemical treatment, and allow use of toxic substances only after approaches have been tried and determines unsuccessful. Continue to implement the Integrated Pest Management ordinance for county-related operations.*

BIO- 4.6 Control Exotic Vegetation. *Remove and replace invasive exotic plants with native plants as part of stream restoration projects and as a condition of site-specific development approval in than SCA and include monitoring to prevent reestablishment.*

BIO-4.7 Protect Riparian Vegetation. *Retain riparian vegetation for stabilization of stream banks and floodplains, moderating water temperatures, trapping and filtering sediments and other water pollutants, providing wildlife habitat, and aesthetic reasons.*

Consistent: Vegetation management activities are employed to achieve three main goals: maintain channels, reduce fire fuels, and restore creek habitat by removing invasive non-native plants and re-vegetating with native plants. Maintaining channel function is achieved by limbing and trimming, cattail cutting, removing vegetation from channel bottoms, and clearing trash. These activities occur from the channel bottom to the top of the high water mark, and include trimming tree limbs from trees and shrubs growing in the channel and trimming branches that hang down into the active channel. These activities employ vegetation control methods such as cutting and removing vegetation above the ground by hand or with loppers, hand saws, chainsaws, pole saws, weed eaters and other hand tools. Bladed weed-eaters are used to cut cattails. Fire fuel reduction is achieved by mowing on tops of banks and levees, removal of fallen trees, removal of standing dead trees, and thinning and removal of non-native species such as ivy and Himalayan blackberry. For mowing, crews use weed-eaters for smaller areas and tractors with mowing attachments for larger, more open areas. Tree removal and thinning employ a mix of tools including chainsaws, loppers, hand saws, pole saws, hedge trimmers, and other hand tools.

Tree removal is a rare event. Program BIO-4f of the Countywide Plan recognizes that tree growth may be cleared from the stream channel where removal is essential to protect against property damage or prevent safety hazards Removal of mature, healthy, native trees is only indicated when pruning is insufficient to reduce unacceptably high hydraulic roughness in the channel. For example, an arroyo willow growing on a newly established gravel bar may need to be removed if it threatens to block flow through a structure. Removal of sick, dying, or dead trees is indicated when they reduce channel capacity, increase flood hazard, and/or are a safety hazard to adjacent structures. Tree health and hazard potential will be determined by appropriate environmental staff (arborist or biologist). Snags shall be left in place to provide habitat for birds and small mammals if they do not otherwise pose a flood or safety hazard. Staff will consult with CDFG whenever possible if tree removal is necessary, and retention of large wood debris in the creeks will follow CDFG protocols.

Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program. Since 1999 STRAW has restored 7,159 linear feet (5.9 acres) of riparian corridor along east Marin creeks, removing invasive non-native plants and revegetating with natives to restore streamside habitat. The STRAW Program is included as a partner in the Marin County Flood Control District's Routine Maintenance Program (RMA).

Overall, the vegetation removal within flood control creeks and drainages will be the minimum amount necessary to clear these areas of obstructions. As discussed in detail in Sections V. 7, the proposed project will adhere to the mitigation measures outlined in that section, ensuring that the project would have less-than-significant impacts on riparian systems or the plants and animals that inhabit the riparian zone. Therefore, the project has been mitigated to consistency with Policies BIO-1.5, BIO-1.7, BIO-1.8, BIO-4.6 and BIO-4.7.

(4) Protection of Stream Conservation Areas

BIO-4.1 Restrict Land Use in Stream Conservation Areas. *A Stream Conservation Area (SCA) is established to protect the active channel, water quality and flood control functions, and associated fish and wildlife habitat values along streams. Development shall be set back to protect the stream and provide an upland buffer, which is important to protect significant resources that may be present and provide a transitional protection zone. Best management practices shall be adhered to in all designated SCAs. Best management practices are also strongly encouraged in ephemeral streams not defined as SCAs.*

Allowable uses in SCAs in any corridor consist of the following, provided they conform to zoning and all relevant criteria and standards for SCAs, as follows:

- Existing permitted or legal nonconforming structures or improvements, their repair, and their retrofit within the existing footprint;
- Projects to improve fish and wildlife habitat;
- Driveway, road and utility crossings, if no other location is feasible;
- Water monitoring installations;
- Passive recreation that does not significantly disturb native species;
- Necessary water supply and flood control projects that minimize impacts to stream function and to fish and wildlife habitat;
- Agricultural uses that do not result in any of the following:
  a. The removal of woody riparian vegetation;
  b. The installation of fencing within the SCA that prevents wildlife access to the riparian habitat within the SCA;
  c. Animal confinement within the SCA; and
  d. A substantial increase in sedimentation.

BIO-4.4 Promote Natural Stream Channel Function*. Retain and, where possible, restore the hydraulic capacity and natural functions of stream channels in SCAs. Discourage alteration of the bed or banks of the stream, including filling, grading, excavating, and installation of storm drains and culverts. When feasible replace impervious surfaces with pervious surfaces. Protect*

and enhance fish habitat, including through retention of large woody debris, except in cases where removal is essential to protect against property damage or prevent safety hazards. In no case shall alterations that create barriers to fish migration be allowed on streams mapped as historically supporting salmonids. Alteration of natural channels within SCAs for flood control shall be designed and constructed in a manner that retains and protects the riparian vegetation, allows for sufficient capacity and natural channel migration, and allows for reestablishment of woody trees and shrubs without compromising the flood flow capacity where avoidance of existing riparian vegetation is not possible.

***BIO- 4.5 Restore and Stabilize Stream Channels**. Pursue stream restoration and appropriate channel redesign where sufficient right-of-way exists that includes the following: a hydraulic design, a channel plan form, a composite channel cross-section that incorporates low flow and bankfull channels, removal and control of invasive exotic plant species, and bio-technical bank stabilization methods to promote quick reestablishment of riparian trees and other native vegetation.*

***BIO-4.10 Promote Interagency Cooperation.** Work in close cooperation with flood control districts, water districts, and wildlife agencies in the design and choice of materials for construction and alterations within SCAs.*

Consistent: Many of the channels included in the project areas are subject to protection under the Stream Conservation Area protection policies as set forth in the Countywide Plan. As discussed in Section V. 3. (c) And V. 11. (d, e), the proposed project is a flood control project that will maintain functioning channels for conveyance of water flow, minimize impacts to fish and wildlife habitat and reduce risk of fire and flooding. Thus, it is a permitted activity within the SCA, as set forth in the Countywide Plan Policy BIO-4.1 Excavation of accumulated sediment, selective vegetation removal within the creeks, channels and drainage ditches at the project sites, and minimal streambank stabilization where needed will work to restore the hydraulic and natural functions of project drainages to reduce the risk of flooding, thus the project is consistent with Polices BIO-4.4 and 4.5. The project promote interagency cooperation in that it will be implemented by the Marin County Flood Control District in collaboration with local municipalities including the Cities of Mill Valley, Larkspur, Ross, San Anselmo, Fairfax and Novato. Permits for the project will be issued by the trustee agencies including the Department of Fish and Game, the US Army Corps of Engineers, the Regional Water Quality Control Board, the US Fish and Wildlife Service and the National Marine Fisheries Service.

(5) Species and Habitat Preservation

***BIO-1.1 Protect Wetlands, Habitat for Special-Status Species, Sensitive Natural Communities, and Important Wildlife Nursery Areas and Movement Corridors**. Protect sensitive biological resources, wetlands, migratory species of the Pacific Flyway, and wildlife movement corridors through careful environmental review of proposed development applications, including consideration of cumulative impacts, participation in comprehensive habitat management programs with other local and resource agencies, and continue acquisition and management of open space lands that provide for permanent protection of important natural habitats.*

***BIO-1.3 Protect Woodlands, Forests, and Tree Resources**. Protect large native trees, trees with historical importance; oak woodlands; healthy and safe eucalyptus groves that support colonies of monarch butterflies, colonial nesting birds, or known raptor sites; and forest habitats. Prevent the untimely removal of trees through the implementation of standards in the Development Code and*

Native Tree Preservation and Protection Ordinance. Encourage other local agencies to adopt tree preservation ordinances to protect native trees and woodlands, regardless of whether they are located in urban or undeveloped areas

BIO-2.4 Protect Wildlife Nursery Areas and Movement Corridors. *Ensure that important corridors for wildlife movement and dispersal are protected as a condition of discretionary permits, including consideration of cumulative impacts. Features of particular importance to wildlife for movement may include riparian corridors, shorelines of the coast and bay, and ridgelines. Linkages and corridors shall be provided that connect sensitive habitat areas such as woodlands, forests, wetlands, and essential habitat for special-status species, including an assessment of cumulative impacts.*

BIO-2.5 Restrict Disturbance in Sensitive Habitat During Nesting Season. *Limit construction and other sources of potential disturbance in sensitive riparian corridors, wetlands, and baylands to protect bird nesting activities. Disturbance should generally be set back from sensitive habitat during the nesting season from March 1 through August 1 to protect bird nesting, rearing, and fledging activities. Pre-construction surveys should be conducted by a qualified professional where development is proposed in sensitive habitat areas during the nesting season, and appropriate restrictions should be defined to protect nests in active use and ensure that any young have fledged before construction proceeds.*

BIO-2.7 Protect Sensitive Coastal Habitat. *Protect coastal dunes, streams, and wetlands, and sensitive wildlife habitat from development in accordance with coastal resource management standards in the development code.*

BIO-5.1 Protect the Baylands Corridor. *Ensure that baylands and large, adjacent essential uplands are protected, and encourage enhancement efforts for baylands, including those in the baylands corridor.*

BIO-5.3 Leave Tidelands in Their Natural State. *Require that all tidelands be left in their natural state to respect their biological importance to the estuarine ecosystem. Any modifications should be limited to habitat restoration or enhancement plans approved by regulatory agencies.*

BIO-5.5 Protect Freshwater Habitats. *Preserve and where possible expand habitats associated with freshwater streams, seasonal wetlands, and small former marshes to facilitate the circulation, distribution, and flow of fresh water, and to enhance associated habitat values.*

BIO-5.6 Use Flood Basins for Seasonal Habitat. *Utilize natural or manage man-made flood basins to provide seasonal habitat for waterfowl and shorebirds and prohibit development in these basins to protect habitat values.*

Consistent: A Biological Assessment (BA) was completed for the RMA program in June 2011, which addresses the project's potential impacts to water quality, wildlife and sensitive native habitats. Based on the findings in the BA, the RMA program specifies appropriate General and Activity-specific Conditions, and species-specific Avoidance and Minimization Measures (AMMs) to be employed at each project site and for each type of maintenance activity. Program implementation also includes employment of existing Best Management Practices (BMPs) from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and the Federal Emergency Management Agency (FEMA).

General and activity-specific conditions, AMMs and BMPs are incorporated into the overall RMA project description and spelled out in the individual project fact sheets for each site. An Environmental Compliance Coordinator (ECC) will work with the project on a daily basis to ensure that all AMMs and BMPs are implemented as prescribed in the field, depending on the location and nature of the activity. The ECC will be on-site to monitor the outcome of all conservation measures to assure protection of all fish and wildlife species and their habitats

As prescribed in the Biological Assessment, pre-construction surveys for special-status animal and plant species will be completed at individual sites as necessary depending on work windows and seasonal conditions. If surveys confirm species occurrence at a project site, a biologist will oversee all construction work and implement appropriate conservation measures to protect these species. If necessary, avoidance of work areas and stop work orders will be employed if impacts to sensitive species and their habitat cannot be mitigated to a less-then-significant level or avoided completely. As discussed in detail in Sections V. 7. (a, b, c), the proposed project, will adhere to the mitigation measures outlined in those sections, ensuring that the project would have less-than-significant impacts on all special-status species, wildlife and habitat diversity. Therefore, the project has been mitigated to consistency with Policies BIO-1.1, BIO-1.3, BIO-2.4, BIO-2.5, BIO-2.7.

Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program. Since 1999 STRAW has restored 7,159 linear feet (5.9 acres) of riparian corridor along east Marin creeks, removing invasive non-native plants and revegetating with natives to restore streamside habitat. The STRAW Program is included as a partner in the Marin County Flood Control District's Routine Maintenance Program (RMA).

Sensitive natural communities are those that are considered rare in the region, support special-status plant or wildlife species, or receive regulatory protection (i.e., §404 of the Clean Water Act and/or the §§1600 et seq. of the California Fish and Game Code). Within the project sites, two sensitive natural communities have the potential to be affected by project activities: northern coastal salt marsh and coastal brackish marsh (CDFG 2011). These communities are found within or adjacent to some of the project sites and are expected to fall under federal and/or state jurisdictions as wetlands or waters of the U.S. or waters of the state. Wetlands and Other Waters of the U.S. Wetlands and other aquatic resources such as riparian areas and certain aquatic vegetation communities are considered sensitive biological resources and can fall under the jurisdiction of several regulatory agencies. Wetlands are generally defined by the USACE as "those areas that are inundated or saturated by surface or ground water… that under normal circumstances support a prevalence of vegetation typically adapted for life in saturated soil conditions" (33 CFR 328.3 [b]). Indicators of three wetland parameters determined by field investigation must be present for a site to be classified as a wetland by the USACE; these are hydric soils, hydrophytic vegetation, and wetlands hydrology. Approximately one third of the sites have been initially identified as possibly meeting the USACE definition of wetlands. A formal wetlands delineation for those 38 sites will be completed in Spring or Summer 2012. Mitigation measures to protect these sites are outlined in Section 7 below. In tideland areas maintenance work will be limited to that which is absolutely necessary to restore flow through to the tidelands from upland drainage areas (e.g. clearing sediment from culvert outfalls). The minimal amount of work proposed in the tidelands area will be conditioned by permits issued by the Department of Fish and Game (1600 Streambed Alteration Agreement) and the Army Corps of Engineers (404 permit), with consultation from US Fish and

Wildlife Service the National Marine Fisheries Service, and the Regional Water Quality Control Board (401 Certification). General and activity-specific conditions, AMMs and BMPs prescribed for all project sites located in tideland areas will mitigate the project's impacts to less-than-significant, therefore, the project will be consistent with Policies BIO-5.1, BIO-5.3, BIO-5.5, and BIO-5.6.

(6) Protection of Watersheds and Water Quality

WR-1.1. Protect Watersheds and Aquifer Recharge. *Give high priority to the protection of watersheds, aquifer-recharge areas, and natural drainage systems in any consideration of land use.*

WR-2.3. Avoid Erosion and Sedimentation. *Minimize soil erosion and discharge of sediments into surface runoff, drainage systems, and water bodies. Continue to require grading plans that address avoidance of soil erosion and on-site sediment retention. Require developments to include on-site facilities for the retention of sediments, and, if necessary, require continued monitoring and maintenance of these facilities upon project completion.*

WR-2.4 Design County Facilities to Minimize Pollutant Input. *Design, construct, and maintain County building, landscaped areas, roads, bridges, drainages, and other facilities to minimize the volume of toxic, nutrients, sediment, and other pollutants in stormwater flows, and continue to improve road maintenance methods to reduce erosion and sedimentation potential.*

Consistent: Implementation of this project will help to restore the normal drainage patterns within the project area by removing accumulated sediment from the creeks, channels and drainage ditches at selected sites. There will be a temporary increase in turbidity in these drainages as sediment is disturbed from the dredging process. These impacts will be short-term and localized over the 1-7 day sediment removal project period. DPW will use Best Management Practices (BMPs) outlined in the Bay Area Stormwater Management Agencies Association (BASMAA) Manual and FishNet4C Guidelines for Protecting Aquatic Habitat and Salmon Fisheries for County Road Maintenance. These BMPs include minimizing loss of native vegetation, conducting the work from the road whenever possible, timing the work prior to the rainy season, minimizing sediment disturbance and suspension within the water, taking all excavated material to an upland disposal site, and sediment/erosion controls to keep excess soil from washing or blowing away during removal, transport and storage (including sediment traps, silt fences, coir logs and wattles containing weed-free rice straw, as necessary). Dewatering will be conducted in a manner to reduce turbidity downstream of the project area. To prevent streambed erosion from the use of cofferdams, pipes and pumps used to de-water the creek, diversion pipe outlets shall be placed on hard surfaces or temporary outfall dissipation structures shall be installed (i.e. rock piles). No phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start-up of any phase of the project that may result in sediment run-off to the stream. If rainfall is predicted, erosion control measures must be kept on-site and be in place prior to the onset of precipitation. As discussed in detail in Sections V. 3. (b) and V. 4. (c), the proposed project will adhere to the mitigation measures outlined in those sections, ensuring that the project would have less-than-significant impacts on water quality and watersheds. Therefore, the project has been mitigated to consistency with Policies WR-1.1, 2.3 and 2.4.

(7) Avoidance of Environmental Hazards

EH-2.1. Avoid Hazard Areas. *Require development to avoid or minimize potential hazards from earthquakes and unstable ground conditions.*

EH-3.2. Retain Natural Conditions. *Ensure that flow capacity is maintained in stream channels and floodplains, and achieve flood control using biotechnical techniques instead of storm drains, culverts, riprap, and other forms of structural stabilization.*

EH-4.2 Remove Hazardous Vegetation. *Abate the build-up of vegetation around existing structures or on vacant properties that could help fuel fires.*

Consistent: The RMA project is maintenance in nature and no new development or increases of footprint of existing development is proposed; therefore no increase in impacts from an earthquakes on structures is predicted for the project. This project will restore the channel function of these drainages by removing obstructing vegetation and accumulated sediment, which should reduce the potential for flooding of adjacent roadways and promote public safety of people and property from the risks associated with flooding. The proposed bank stabilization associated with the RMA uses biotechnical designs and does not include installation of rip rap or other forms of structural stabilization. Bank stabilization and channel clearing activities will be implemented in a way that maintains natural channel features and watershed functions. Mowing of levees and along top of bank in selected channel reaches is done before the July 4th holiday in order to reduce fire fuel loading and to minimize the risk of grass fires, therefore, the project will be consistent with Policies EH-2.1, 3.2 and 4.2.

(8) Protection of Air Quality

AIR-2.0. Protection from Emissions. *Minimize the potential impacts from land uses that may emit pollution and/or odors on residential and other land uses sensitive to such emissions in unincorporated Marin County.*

AIR-5.0 Adaptation to Climate Change- Adopt policies and programs that promote resilient human and natural systems in order to ease the impacts of climate change.

Consistent: The effects on air quality are from exhaust coming from heavy equipment during dredging. These impacts are short-term and temporal, occurring incrementally over the 1-7 day work periods. As discussed in Section V. 5.(a), the project would contribute minimally to air impacts; no significant negative impacts related to air quality are identified. The re-vegetation of stream banks by the STRAW program serves to sequester carbon and thus reduce the impacts of climate change. Consequently, the proposed project will be consistent with Policy AIR-2.1.

(9) Protection of Open Space and Trails

Policy TRL-1.1. Protect the Existing Countywide Trail System. *Maintain the existing countywide trail system and protect the public's right to access it.*

Consistent: The project will not impede access to the Countywide Trail System in any way nor will it create any impacts that will decrease the public's enjoyment of the trail system or open space areas in any way, therefore it is consistent with the Countywide Plan Policies to protect open space and trails.

(10) Minimize Noise Impacts

NO-1.3. Regulate Noise Generating Activities. *Require measures to minimize noise exposure to neighboring properties, open space, and wildlife habitat from construction-related activities, yard maintenance equipment, and other noise sources, such as amplified music.*

Consistent: As discussed in Section V. 10. (a, b), the noise associated with sediment removal activities is limited to the sound of heavy equipment operating during normal daytime working hours (approximately 8:00 a.m. to 4:00 p.m.). The project is short-term (approximately 1-7 days, depending on site), most of the work is not near residences and for those that are, private landowners have concurred with implementation of this flood control maintenance project on their lands and project dates will be coordinated with these landowners in advance of project commencement. Noise impacts could cause temporary disturbance to wildlife species such as songbirds that use the riparian zone. Any disturbed or flushed resident wildlife are expected to return to the project area after completion of daily construction activities. The project would contribute minimally to noise impacts; no significant impacts related to noise pollution are identified. Therefore, the project will be consistent with Policy NO-1.3.

(11) Protection of Visual Resources

DES-4.1. Preserve Visual Quality *Protect scenic quality and views of the natural environment – including ridgelines and upland greenbelts, hillsides, water, and trees – from adverse impacts related to development.*

Consistent: The visual resources of the project sites would not be adversely impacted by maintenance activities because the overall project is designed to respect the surrounding natural environment and return it to its previous condition (i.e., by removing aggraded sediment, fallen trees or overgrown weeds). Some trimming of riparian trees will occur, but the maintenance project would not result in visual impacts to public or scenic views and vistas from adjacent roadways, therefore, the project will be consistent with Policy DES-4.1.

(12) Avoid Impacts to Historical Resources

HAR-1.3. Avoid Impacts to Historical Resources. Ensure that human activity avoids damaging cultural resources.

Consistent: As discussed in Sections V. 14. (a, b), the proposed project will disturb only aggraded sediment that has been carried from the upper watershed down through the stream and channel system, and some sites to be dredged have previously been dredged multiple times in the same locations. Should any cultural resources be discovered during sediment removal activities, all work shall immediately be stopped and the services of a qualified archaeologist from Sonoma State University's Cultural Resources Department shall be engaged to assess the value of the resource and to develop appropriate mitigation measures. As discussed in detail in Sections V. 14. (a), the proposed project will adhere to the mitigation measures outlined in that section, ensuring that the project would have less-than-significant impacts on historical resources. Therefore, the project has been mitigated to consistency with Policy HAR-1.3.

CITY OF MILL VALLEY GENERAL PLAN (1989)

Section 5: Public Health and Safety; PH-1: The City shall strive to ensure that all grading, site improvements and structures minimize geotechnical, seismic and flood hazards to people and property.

A large portion of developed and undeveloped Mill Valley lands are subject to flooding due to a combination of factors including periodic heavy winter rainfalls, tidal fluctuations, and potentials for tsunami and dam failure due to seismic activity. Flooding as a result of heavy rainfall can result from either of two phenomena: (1) storm water run-off inundation of lowlands due to an inadequate drainage network, and (2) high Bay tides and winds which force the storm water up stream channels. Mill Valley drains into the Richardson Bay Drainage Basin mainly by way of the Basin's major stream, Arroyo Corte Madera Del Presidio. The creek often overflows its banks in the lower reaches during a period of heavy rainfall. Significant encroachment has occurred along Arroyo Corte Madera by urban development and excessive vegetative growth. Both factors have imposed extreme limitations on channel flow capacities along substantial portions of the stream, resulting in major flood problems. Damaging floods have periodically occurred over this area as a result.

Consistent: The primary objective of the proposed RMA project within the City of Mill Valley's jurisdiction is to reduce the potential risk of flooding by maintaining the channels and removing obstructions from related flood control infrastructure such as tidegates, weirs and trash racks; therefore the RMA program is consistent with the PH-1 Policy of the City of Mill Valley General Plan.

CITY OF NOVATO GENERAL PLAN (1996)

The City of Novato General Plan contains the following policies to protect Watercourses, Wetlands, and Baylands Areas that are applicable to the proposed RMA activities that will be conducted on properties within the City of Novato jurisdiction.

CHAPTER IV- Environment; Watercourses, Wetlands, and Baylands Areas

EN Objective 1– Preserve, protect, and enhance streams and other bodies of water.

EN Policy 1 Ecology of Creeks and Streams. *Preserve and enhance the ecology of creeks and streams.*

EN Policy 2 Vegetation in Watercourse Areas. *Protect vegetation in watercourse areas.*

EN Policy 3 Wildlife Habitat. *Endeavor to preserve and enhance wildlife habitat areas in watercourse areas and control human use of these areas as necessary to protect them.*

EN Policy 4 Erosion Control. *Minimize soil disturbance and surface runoff in the Stream Protection Zones. Pursuant to the City's grading ordinance, work in and adjacent to the zones shall be conducted during the dry season only, at times when the Community Development Department determines that surface runoff will be minimal or containable.*

EN Policy 5 Habitat Restoration. *Restore damaged portions of riparian areas to their natural state, wherever feasible.*

EN Policy 7 Water Quality. *Encourage protection of water resources from pollution and sedimentation, and preserve their environmental and recreation values. count the project's size and cumulative impacts.*

EN Policy 8 Environmentally Sound Flood Control Measures. *Encourage flood control measures that retain the natural features and conditions of watercourses to the maximum feasible extent.*

EN Objective 2- Preserve, protect, and enhance wetlands.

EN Policy 9 Determination of Wetlands. *Recognize the U.S. Army Corps of Engineers (ACE) as the designated permitting agency that regulates wetlands. In regulating wetland activities, the ACE consults with other agencies and organizations including but not limited to U.S. Fish and Wildlife and State Department of Fish and Game.*

EN Policy 10 Wetlands Ecology*. Preserve and enhance wetlands ecology.*

EN Objective 3- Preserve, protect and enhance historic bayland areas.

EN Policy 12 Bayland Area Protection. *Regulate development in the Bayland Overlay Zone so that it does not encroach into wetlands or sensitive wildlife habitats, provided that this regulation does not prevent all use of a property. Discourage human activity that damages fisheries, or habitat for birds, fish or other wildlife.*

EN Objective 4 - Preserve and protect native plant and animal species and their habitat.

EN Policy 18 Species Diversity and Habitat. *Protect biological resources that are necessary to maintain a diversity of plant and animal species.*

EN Policy 19 Special Status Species. *Cooperate with State and Federal Agencies to ensure that development does not substantially adversely affect special status species appearing on the State or Federal list for any rare, endangered, or threatened species. The environmental documentation will screen for the Federal Candidate Species, plants listed on lists 1A, 1B, or 2 of the California Native Plant Society (CNPS), inventory of rare and endangered vascular plants of California and animals designated by CDFG as species of special concern or their current equivalent.*

CHAPTER V- Safety and Noise

SF Objective 3- Reduce flood hazards.

SF Policy 6 Cooperation with Marin County. *Continue to work with the Marin County Public Works Department to minimize negative impacts of storm runoff.*

SF Policy 8 Reducing Flood Hazards. *Reduce flood risk by maintaining effective flood drainage systems and regulating construction.*

SF Policy 9 Storm Drainage System. *Maintain unobstructed water flow in the storm drainage system.*

Consistent: The proposed project is consistent with City of Novato General Plan policies listed above, since the primary objective of the RMA project is to reduce the potential risk and hazards

associated with flooding and to maintain unobstructed flow in the storm drainage systems. During all RMA activities Avoidance and Minimization Measures and BMPs will be implemented to protect and enhance the streams and wetlands within the project area and native habitat found within these systems. Therefore the RMA program is consistent with the Policies EN 1, 2, 3, 4, 5, 7, 8, 9, 10, 12, 18, and 19 and SF 6, 8 and 9.

LAND USE AND PLANNING Section 1- (*continued...*)

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Affect agricultural resources, operations, or contracts (e.g. impacts to soils or farmlands, impacts from incompatible land uses, or conflicts with Williamson Act contracts)? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not change any agricultural resources, operation or contracts; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Disrupt or divide the physical arrangement of an established community (including a low-income or minority community)? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not divide or affect the physical arrangement of the established communities; therefore this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
e) Result in substantial alteration of the character or functioning of the community, or present or planned use of an area? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not alter the character or function of the community and will actually be a benefit to the community by reducing the potential frequency of flooding; therefore, the project will result in less-than-significant impacts.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
f) Substantially increase the demand for neighborhood or regional parks or other recreational facilities, or affect existing recreational opportunities? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not increase demand for parks or other facilities, therefore this is a less-than-significant impact.

2. **POPULATION AND HOUSING.** ***Would the proposal:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Increase density that would exceed official population projections for the planning area within which the project site is located as set forth in the Countywide Plan and/or community plan? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not have an effect on population nor density of housing; therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Induce substantial growth in an area either directly or indirectly (e.g. through projects in an undeveloped area or extension of major infrastructure)? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not have an effect on growth of an area either directly or indirectly; therefore the project will result in less-than-significant impacts.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Displace existing housing, especially affordable housing? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not displace existing housing of any kind; therefore, the project will result in a less-than-significant impact.

3. **GEOPHYSICAL.** ***Would the proposal result in or expose people to potential impacts involving:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Location in an area of geologic hazards, including but not necessarily limited to: 1) active or potentially active fault zones; 2) landslides or mudslides; 3) slope instability or ground failure; 4) subsidence; 5) expansive soils; 6) liquefaction; 7) tsunami ; or 8) similar hazards? (source #(s): 1)	[ ]	[ ]	[X]	[ ]

This is a routine flood control maintenance project, which will not result in the building of any structures, not increase the vulnerability of other structures to geologic hazards, nor diminish stability of structures within the project area. Rather, the maintenance activities will add to the protection of the public and public infrastructure from potential geologic hazards by increasing channel function and removing debris from culverts and around

flood control infrastructure such as trash racks and pump stations. Therefore the project will result in less-than-significant impacts.

b)	**Substantial erosion of soils due to wind or water forces and attendant siltation from excavation, grading, or fill? (source #(s): 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
		[ ]	[X]	[ ]	[ ]

This is a flood control maintenance project with primary objectives to remove vegetation, debris and accumulated sediment to maintain channel function and facilitate unobstructed flow around public infrastructure including bridges, storm drains, trash racks, and pump stations. Another aspect of the project is to prevent bank erosion and sedimentation into adjacent creek channels. The only sediment that will be excavated is below water line in creeks, channels sediment basins and drainage ditches; there will be no excavating or grading of adjacent channel banks, and no permanent fill is involved in the project unless it is related to a bio-engineered streambank stabilization project. Each activity includes prescribed Best Management Practices (BMPs), which are mandated to be employed during and after project implementation. Erosion control BMPs are implemented to keep soil from leaving the work sites. During work activities there may be a temporary increase in turbidity in drainages as sediment is disturbed from the dredging process and potential water quality impacts could have a negative effect upon aquatic life. Avoidance and minimization measures to protect threatened and endangered species and sensitive habitats are discussed in Section V. 7 (a). Implementation of the following mitigation measures are incorporated into the project description and will decrease the impacts of erosion and sedimentation to a less than significant level.

MITIGATION MEASURES

V.3 (b)-1. The District shall designate an Environmental Compliance Coordinator (ECC) to oversee the implementation of the RMA in the field. Before commencement of a maintenance activity, the ECC shall review Site Fact Sheets for specific information on the type, location and extent of the activity and associated areas of disturbance and determine the Avoidance and Minimization Measures and Best Management Practices (BMPs) to implement prior to the maintenance activity. The ECC shall distribute the Site Fact Sheet to the Maintenance Supervisor five days before beginning the maintenance activity.

V.3 (b)-2. Erosion control BMPs shall be incorporated into each project to minimize the discharge of sediments and other pollutants downstream and to prevent channel or streambank erosion or destabilization once the activity has been completed. Erosion control measures shall be monitored during and after storm events and modifications shall be made, if needed.

V.3 (b)-3. If a maintenance activity may cause the introduction of sediments into the stream, no phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start up of any phase of the project that may result in sediment run-off to the stream. All associated erosion control measures must be kept on-site and be in place prior to the onset of precipitation. After any storm event, the ECC shall inspect all sites under construction and all sites scheduled to begin construction within the next 72 hours, for erosion and sedimentation problems and take corrective action as needed.

V.3 (b)-4. DPW shall construct the project in a manner that reduces turbidity and protects water quality, resident fish and other aquatic species. To prevent streambed erosion from the use of temporary cofferdams, pipes and pumps used to de-water the creek channel, diversion pipe outlets would be placed on hard surfaces or outfall

protection in the form of rock or similar material would be installed. These temporary cofferdams shall be secured with plastic sheeting and anchored in place. All temporary fill for construction of cofferdams, pumps, pipes and sheet plastic shall be removed from the stream after project completion and the creeks shall be restored to their natural condition.

V.3 (b)-5. No debris, soil, silt, sand, cement, concrete, or washings thereof, or other construction related materials or wastes, oil or petroleum products or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into waters of the State. When operations are completed, any excess material that may be washed into waters of the State shall be removed from the work area and transported to a legal upland spoils disposal site.

MITIGATION MONITORING MEASURES

V.3(b)-1-5. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Substantial changes in topography from excavation, grading or fill, including but not necessarily limited to: 1) ground surface relief features; 2) geologic substructures or unstable soil conditions; and 3) unique geologic or physical features? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

A long-term objective of this maintenance project is to restore natural channel formation and to decrease the potential risk and frequency of flooding. A localized change in stream channel and sediment basin topography will occur through the removal of sediment within the creek channels and drainages. It shall be the minimum amount needed to restore natural channel function and facilitate unobstructed flow conditions. Given the nature of the project, the changes in channel topography are desired outcomes. Given that the sediment to be removed is caused by deposition of eroded sediment from the upper watershed into the lower flood control drainages, impacts to these channels from excavation should be positive in nature. Consequently, the project will result in less-than-significant impacts.

4. WATER. ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Substantial changes in absorption rates, drainage patterns, or the rate and amount of surface runoff? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Drainage patterns and rate of surface run-off into drainages within the project area from the upper watersheds and adjacent neighborhoods will remain unaltered. The removal of sediment and obstructing vegetation from these channels will increase the channel's ability to carry surface run-off during high flood flows and improve connectivity between downstream and upstream habitats. If the channels have greater functional ability after

maintenance has been performed, the potential risk of flooding of adjacent roads and property will be reduced. Consequently, the project will result in less-than-significant impacts.

b) Exposure of people or property to water related hazards, including, but not necessarily limited to: 1) flooding; 2) debris deposition; or 3) similar hazards ? (source #(s): 3)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [ ]	**Less Than Significant Impact** [X]	**Not Applicable** [ ]

This is a flood control project which will decrease potential for flood hazards caused by vegetation or debris deposition around culverts, trash racks, pump stations, and tide gates during high flows. By removing vegetation and sediment from the channels, ditches and sediment basins identified within the project area, the channels will be altered to improve natural channel function and decrease the threat of potential flooding of adjacent roads and property. The project will have an overall beneficial effect on preventing potential flood hazards and debris deposition; consequently the project will result in less-than-significant impacts.

c) Discharge of pollutants into surface or ground waters or other alteration of surface or ground water quality (e.g. temperature, dissolved oxygen or turbidity)? (source #(s): 3)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

This is a routine flood control maintenance project with the primary objective to remove vegetation and accumulated sediment to maintain channel function and unobstructed flow around structures including bridges, storm drain outlets, and pump stations, and to maintain stable stream banks where necessary. The only sediment that will be excavated is below water line in creeks, channels and drainage ditches; there will be no excavating or grading of adjacent channel banks, and no permanent fill is involved in the project. Each activity includes prescribed Best Management Practices (BMPs), which are mandated to be employed during and after project implementation. The BMPs are designed to keep soil from leaving the work sites (erosion control BMPs) and to repair collapsing stream banks which often contribute to siltation of streams (bio-engineered stream bank repair BMPs). During implementation there may be a temporary increase in turbidity as sediment is disturbed by the dredging process. Potential water quality impacts could have a negative effect upon water quality and aquatic life. Potential impacts to threatened and endangered species that are present within or near the project site area are discussed in Section V.7(a). Implementation of the following mitigation measures will decrease the risk of impacts of erosion or siltation to water quality and aquatic resources and will reduce these impacts to less than significant.

MITIGATION MEASURES

V.4(c)-1. The District shall implement maintenance activities in a manner that reduces turbidity and protects water quality, resident fish and other aquatic species. No debris, soil, silt, sand, cement, concrete, or washings thereof, or other construction related materials or wastes, oil or petroleum products or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into waters of the State. When operations are completed, any excess material shall be removed from the work area and transported to a legal upland spoils disposal site.

V.4(c)-2. Appropriate BMPs shall be incorporated into each project to minimize the re-suspension and discharge of sediments and other pollutants downstream and to prevent channel or streambank erosion or destabilization once the activity has been completed. BMPs to be implemented for each type of activity are referenced in the

program documents and prescribed in the Project Fact Sheets for each site. Erosion control measures shall be monitored during and after storm events and modifications made, if needed. BMPS to be implemented are taken from the the Bay Area Stormwater Management Agencies Association (BASMAA) Manual and the FishNet4C Guidelines for Protecting Aquatic Habitat and Salmon Fisheries for County Road Maintenance.

V.4(c)-3. To prevent streambed erosion from the use of cofferdams, pipes and pumps used to de-water the creek, diversion pipe outlets shall be placed on hard surfaces or temporary outfall dissipation structures shall be installed (i.e. rock piles). Temporary cofferdams shall be secured with plastic sheeting and anchored in place. All temporary fill for construction of cofferdams, pumps, pipes and sheet plastic shall be removed from the stream after project completion and the creeks shall be restored to their natural condition.

V.4(c)-4. No phase of the activity shall be started unless all equipment and materials are able to be removed from the channel at least 12 hours prior to the onset of precipitation. Seventy-two hour weather forecasts from the National Weather Service shall be consulted prior to the start up of any phase of the project that may result in sediment run-off to the stream. If rainfall is predicted, erosion control measures must be kept on-site and be in place prior to the onset of precipitation. After any storm event, the Environmental Compliance Coordinator shall inspect all sites under construction and all sites scheduled to begin construction within the next 72 hours, for erosion and sedimentation problems and take corrective action as needed.

MITIGATION MONITORING MEASURES

V.4(c)-1-6. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

d)	**Substantial change in the amount of surface water in any water body or ground water either through direct additions or withdrawals, or through intersection of an aquifer by cuts or excavations? (source #(s):** 3)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

A select set of sites within the project will need to be temporarily dewatered for equipment access for sediment removal and bank stabilization aspects of the project and to protect special status species such as steelhead trout. Creek flows will be diverted by the construction of temporary cofferdams around the active construction site and water will be transported from upstream to downstream reaches via pumps and pipes/hoses. The cofferdams will be constructed with native materials, including sand bags, gravel bags or equivalent materials and be sealed and secured with plastic sheeting and anchored in place. There will be temporary impacts on water resources within these creek channels during the dewatering process. This impact will be short-term and localized but has the potential to adversely affect aquatic resources in the project area. Threatened and endangered species that are present or near the project site are discussed in Section V.7.(a) and applicable mitigations are proposed to protect these species during dewatering. Implementation of the following best management practices will decrease the risk of impacts to water resources resulting from the dewatering process and reduce these impacts to less than significant.

MITIGATION MEASURES

V.4(d)-1. The District shall construct the projects in a manner that protects fish and other aquatic resources and avoids loss of their habitat. A biologist shall oversee project work and implement any necessary conservation

measures to protect these species, including pre-construction surveys and rescue and relocation to suitable upstream or downstream habitat.

V.4(d)-2. Cofferdams used to divert water shall be constructed with clean river gravel or sand bags and sealed with sheet plastic. Intakes and outlets should be designed to minimize turbidity and the potential to wash contaminants into the stream. If a work site is to be temporarily dewatered by pumping, intakes should be completely screened with wire mesh not larger than 5 millimeters to prevent amphibians from entering the pump system. On salmonid streams, the intake pipe shall be fitted with fish screens meeting CDFG and NOAA Fisheries' criteria to prevent entrainment or impingement of small fish (National Marine Fisheries Service 1997). A filtration/settling system must be included to reduce downstream turbidity (i.e. filter fabric, turbidity curtain). The selection of an appropriate system is based on the rate of discharge. If feasible, water that is pumped into a pipe should discharge onto the top of bank into a densely vegetated area, which may require extra hose length. Once the project work is complete, water should be slowly released back into the work area to prevent erosion and decrease turbidity. The channel and soil surface shall be restored to its original or design configuration after the work is complete. Any material added to the channel or basin to provide support for the work approved under this provision shall be removed unless required for erosion control or habitat enhancement and/or restoration. All cofferdams, pumps, pipes, sheet plastic, silt fences or other non-native materials shall be removed from the stream upon project completion.

V.4(d)-3. Sufficient water shall at all times be allowed to pass downstream to maintain aquatic life below the diversion dam.

V.4(d)-4. For minor actions where the disturbance to construct cofferdams to isolate the work site would be greater than that which would occur in completing the proposed action, measures shall be put in place immediately downstream of the work site to capture suspended sediment. This may include installation of silt catchment fences across the drainage or placement of a straw wattle or filter berm of clean river gravel. Silt fences and other non-native materials shall be removed from the stream following completion of the activity.

MITIGATION MONITORING MEASURES

V.4(d)-1-4. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

e) Substantial changes in the flow of surface or ground waters, including, but not necessarily limited to: 1) currents; 2) rate of flow; or 3) the course or direction of water movements? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The natural direction and rate of flow of groundwater will remain unchanged. The natural direction of flow of the creeks and channels will not change, but the rates of surface flow in some areas may increase with the decreased coefficient of friction resulting from the removal of sediment. As the channel function is increased, there may be a decrease in flood flows coming from the creeks and channels onto adjacent roads and properties, which is the objective of the project. Therefore, this is a less-than-significant impact.

f) Substantial reduction in the amount of water otherwise available for public water supplies? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and will not reduce the amount of water supply available to the public; therefore, this is a less-than-significant impact.

5. **AIR QUALITY.** ***Would the proposal:***

a) Generate substantial air emissions that could violate official air quality standards or contribute substantially to an existing or projected air quality violation? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only air pollutants that will be produced will come from the exhaust fumes from the heavy equipment used for the maintenance project. Since the work will occur out in the open air and over a short duration in each project area (1-7 days, depending on project site), the impact on air quality will be less-than-significant.

b) Expose sensitive receptors to pollutants, such as noxious fumes or fugitive dust? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only air pollutants that will be produced will come from the exhaust fumes from the heavy equipment used for the maintenance project. Since the work will occur out in the open air and over a short duration in each project area (1-7 days, depending on project site), the impact to sensitive receptors will be less-than-significant. The impact from dust will be minimal during sediment removal since the work is being done in the wet environment with very little volatile dust, therefore the impact to sensitive receptors will be less-than-significant.

c) Alter air movement, moisture, or temperature, or cause any change in climate? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Planting of streamside native vegetation occurs as part of the STRAW Program, serving to decrease stream temperatures, increase carbon sequestration and reduce the impacts of global climate change, therefore, this is a less-than-significant impact.

d) Create objectionable odors? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The only odors that will be produced will come from the exhaust fumes from the heavy equipment used for the project and potentially smell coming from anaerobic soil conditions in a super saturated environment. The work will occur out in the open air and over a short duration (1-7 days, depending on project site), therefore the impact from objectionable odors will be less-than-significant.

6. TRANSPORTATION/CIRCULATION. ***Would the proposal result in:***

a) Substantial increase in vehicle trips or traffic congestion such that existing levels of service on affected roadways will deteriorate below acceptable County standards? (source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The project will deploy vehicles and equipment on a daily basis to the various project sites, where it will remain until the project is completed each day. No substantial increase in vehicular traffic or congestion will occur because of the project. The level of service on affected roadways will not drop below acceptable County standards. These impacts will be minor and are commensurate with currently-occurring traffic impacts associated with routine road maintenance activities along these roads in Marin County. Therefore, this is a less-than-significant impact.

b) Traffic hazards related to: 1) safety from design features (e.g. sharp curves or dangerous intersections); 2) barriers to pedestrians or bicyclists; or 3) incompatible uses (e.g. farm equipment)? ((source #(s): 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[X]	[ ]	[ ]

Project implementation will not result in dangerous design features or incompatible uses. Temporary staging of equipment along the road right-of-way could result in the temporary re-direction of vehicle, bicycle and pedestrian traffic. The proposed maintenance project is along County of Marin or local municipality maintained roads and road crews and contractors are experienced at conducting procedures to avoid road traffic hazards. Implementation of the following mitigation measure will decrease the risk of impacts to traffic hazards and reduce these impacts to less than significant.

MITIGATION MEASURES

V.6 (b)-1. The County maintenance crews and any Contractors on the project shall clearly mark alternative routes with traffic control signs during project implementation to ensure public safety.

MITIGATION MONITORING MEASURES

V.6 (b)-1. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
c) Inadequate emergency access or access to nearby uses? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Alternative routes shall be clearly marked with County of Marin traffic control signs or communicated on site by County Roads maintenance crews. Emergency vehicles would be given special consideration to provide unimpeded and continual access to roadways during the maintenance period. Therefore, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
d) Insufficient parking capacity on-site or off-site? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Because equipment will sometimes be staged from the road right-of-way, there could be a temporary loss of pull-out areas used for parking at some sites along project related roads, where staging of County vehicles and equipment could result in the temporary use of part of these pull-out areas. Due to the temporary maintenance nature of the project, this is a less-than-significant impact.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
e) Substantial impacts upon existing transportation systems, including rail, waterborne or air traffic systems? (source #(s): 3)	[ ]	[ ]	[X]	[ ]

Due to the temporary maintenance nature of the project, no substantial impacts upon existing transportation systems will occur on or around the project sites. Minor road diversions may be required during project activities, with alternative routes clearly marked with County of Marin traffic control signs or communicated on site by County Roads maintenance crews. Therefore, this is a less-than-significant impact.

7. BIOLOGICAL RESOURCES. ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
a) Reduction in the number of endangered, threatened or rare species, or substantial alteration of their habitats including, but not necessarily limited to: 1) plants; 2) fish; 3) insects; 4) animals; and 5) birds listed as special-status species by State or Federal Resource Agencies? (source #(s): 3, 4)	[ ]	[X]	[ ]	[ ]

In order to assess and mitigate for potential impacts to special status species and their habitats, a biologic assessment was conducted which looked at potential impacts of all routine maintenance activities on special status species and their habitats; (Biological Assessment for Routine Flood Control Maintenance Activities; Marin County Public Works, California. July 2011). Those species with a moderate to high potential to occur, or those species prominent in the regulatory environment are discussed in detail in the Biological Assessment and actions to avoid impacts to these species and their habitats are summarized in this section.

Based on quad searches and special status species listings from federal and state agencies searches, 80 special status animal species have been identified as having some potential of occurring within the project sites. Of these, only 16 species, based on literature and database reviews and familiarity with local fauna, are considered likely to occur within the project sites and eight of these are listed as threatened or endangered including:

- Central California Coast coho salmon (*Oncorhynchus kisutch*)
- Central California Coast steelhead trout (*Oncorhynchus mykiss irideus*)
- California red-legged frog (*Rana draytonii*)
- Northwestern pond turtle *(Clemmys (Actinemys) marmorata marmorata*)
- California clapper rail (*Rallus longirostris obsoletus*)
- California black rail (*Laterallus jamaicensis coturniculus*)
- Northern spotted owl (*Strix occidentalis caurina*)
- Salt marsh harvest mouse (*Reithrodontomys raviventris*)

Based on quad searches and special status species listings from federal and state agencies searches, 33 plant species have been identified as having some potential of occurring within the project sites. Of these, only four species, based on literature and database reviews and familiarity with local flora, are considered likely to occur within the project sites. None are listed as threatened or endangered; all are species of concern.

- Point Reyes bird's-beak (*Cordylanthus maritimus ssp. palustris*)
- Pale Yellow/Hayfield tarplant *(Hemizonia congesta ssp. congesta)*
- Marsh microseris *(Microseris paludosa)*
- Marin knotweed *(Polygonum marinense)*

The RMA program is complex; at any one time during the work season, different work activities may be occurring at several sites, with several different contractors. In all cases, all routine maintenance activities shall be conducted in such a way as to avoid and/or minimize environmental impacts to special status species, sensitive habitats, and water quality. Pre-construction surveys to locate special status species will be conducted before maintenance activities commence as prescribed and work at each site will be scheduled around relevant work windows where possible to avoid impacts (Table 1; page 7). Work at a site may be re-scheduled based on survey finding if necessary. A suite of General and Activity-Specific Conditions apply to activities implemented as part of the RMA program as well as species-specific Avoidance and Minimization Measures (AMMs).

Best Management Practices (BMPs) have been prescribed for each project site, depending on activity type, site constraints, and species presumed to be present. BMPs to be implemented at each site are referenced from the Bay Area Stormwater Management Agencies Association (BASMAA), California Department of Fish and Game (CDFG), the Fishery Network of the Central California Coastal Counties (FishNet4C), and FEMA.

General and Activity-Specific Conditions, AMMs and BMPs are incorporated into the RMA project description and included in the individual Project Fact Sheets for each site. The job of the Environmental Compliance Coordinator is to ensure that all measures are employed as prescribed in the field prior to, during and after implementation. The General and Activity-Specific Conditions, AMMs and species-specific AMMs are described in detail below and included in the Project Fact Sheets developed for each site.

MITIGATIONS

The following mitigation measures are proposed to avoid and minimize the reduction in the number of endangered, threatened or rare species, or substantial alteration of their habitats and would decrease the risk of impacts to a level of less than significant.

GENERAL CONDITIONS

V.7(a)-1. Designation of Environmental Compliance Coordinator- An Environmental Compliance Coordinator (ECC) shall be designated by the County of Marin Flood Control District. The ECC shall have an understanding of biological resources, missions of regulatory agencies, regulations as they may affect listed species, and the nature of the maintenance activities. In the planning stage, before commencement of a maintenance activity, the ECC shall review project specific information on the type, location, and extent of the activity and associated areas of disturbance. S/he shall determine appropriate pre-construction surveys that may be required, depending on the species involved and the type of activity planned for that project site. The ECC shall ensure that the project crews adhere to General and Activity-Specific Conditions and Avoidance and Minimization Measures prescribed for each site and type of activity.

V.7(a)-2. Assessment, Buffers, and Stop Work Orders- The ECC shall assess field conditions at the start of each work day. If any special status species or nesting birds are observed, the ECC shall coordinate with the contractor foreman to either establish buffers areas, if sufficient, or to stop any activity the ECC deems may result in take or destruction of habitat. Stopped work shall not be allowed to resume until appropriate corrective measures have been completed or it has been determined that nesting is complete. The ECC shall immediately report any unauthorized impacts to the appropriate trustee agency (i.e. USACE, USFWS, NMFS, and/or CDFG).

V.7(a)-3. Contractor Crew Training- The ECC shall ensure that before work starts, all on-site maintenance activity personnel and contractors receive instruction regarding the presence and description of listed species at each project site and the details of appropriate avoidance and minimization measures.

V.7(a)-4. Site Preparation/Wildlife Reconnaissance - The ECC shall walk the site each day before maintenance activities commence to locate wildlife; if any special status wildlife species are noted, work shall not commence until all individuals have left the work site on their own and/or it has been determined that they are not nesting within the project site.

V.7(a)-5. Monitoring and Reporting Program- The ECC shall implement a monitoring and reporting program that shall include, but not be limited to: preparing each year's project list, scheduling pre-construction surveys, overseeing project activity during maintenance, preparing photo documentation, and evaluating post-maintenance restoration/revegetation, if necessary. Reporting regarding project impacts to California red-legged frogs shall be performed in accordance with the terms and conditions issued by the USFWS. Report of sightings will be documented using the CNDDB protocols published by the Department of Fish and Game. .

V.7(a)-6. Work Windows - To avoid impacts to special status species, the maintenance activities carried out shall typically occur during the summer low flow season. The general work window for RMA activities is from April

15th to October 15th, depending on weather. As a rule, work at each site will be scheduled around relevant work windows to avoid impacts. In instances where work needs to be scheduled outside of an established work window for a particular species in a specific location, species-specific pre-construction surveys will be conducted before maintenance activities commence. Work at a site may be re-scheduled based on survey findings, and/or may require application of Avoidance and Minimization Measures before proceeding. In all cases, all routine maintenance activities shall be conducted in such a way as to avoid and/or minimize environmental impacts to special status species, sensitive habitats, and water quality. The work window for streamside restoration by the STRAW Program is from October-March when schools are in session.

SPECIES SPECIFIC AVOIDANCE AND MINIMIZATION MEASURES (AMMs)

Avoidance and Minimization Measures for Fish

FISH-1: Salmonids

Several project sites within the RMA watersheds have the potential for presence of steelhead trout. If steelhead are known to be absent from the project site based on CEMAR/DFG surveys or there are long-standing natural or artificial downstream barriers sufficient to prevent upstream migration, then avoidance has been accomplished and no further actions are necessary. Presence or absence of steelhead trout in each project area is documented in the project fact sheets which are used on a daily basis by the Environmental Compliance Coordinator to guide the implementation of AMMs and BMPs in the field before, during and after completion of maintenance activities.

If steelhead trout are determined or presumed to be present at the project site, then the following Avoidance and Minimization Measures shall be implemented; therefore project impacts will be mitigated to a less-than-significant level:

V.7(a)-7. Work Window: All work in and around salmonid streams is restricted to the period of June 15th to October 15th in any given year. This is to take advantage of low stream flow and avoid the spawning and egg/alevin incubation period which occurs in the late fall and the outmigration period in the spring. Work outside of the channel is not subject to this modified work period.

V.7(a)-8. No equipment is to be operated from within the active stream channel unless the stream has been dewatered and fish have been relocated by a qualified biologist.

V.7(a)-9. To minimize turbidity and stress to salmonid species, personnel shall avoid walking through stream pools and thalwegs, and shall instead walk across riffles or outside of the stream bed to access a project site.

V.7(a)-10. To minimize disturbance during sediment removal activities, if there is flow or seepage in a work site, a reach of creek may have to be de-watered. Before construction of the de-watering system, a qualified biologist shall conduct fish relocation activities, and immediately release captured fish to a suitable habitat near the project site.

V.7(a)-11. Screens shall be placed on all pumps used for dewatering the work site in accordance with NOAA Fisheries' Fish Screening Criteria for Anadromous Salmonids (NMFS, 1997).

V.7(a)-12. If used, coffer dams shall be constructed upstream of the work site within the stream banks, and shall be constructed with clean river gravel or sand bags and covered with sheet plastic. Intakes and outlets shall be designed to minimize turbidity and the potential to wash contaminants into streams.

V.7(a)-13. Pump discharge must be directed into a settling basin to allow silt removal. Once the project work is complete, water shall be slowly released back into the creek to prevent erosion and limit turbidity.

V.7(a)-14. All habitat improvements on salmon and steelhead streams shall be done in accordance with techniques in the California Salmonid Stream Habitat Restoration Manual (CDFG 2010d).

Avoidance and Minimization Measures for Reptiles

REP-1: Northwestern pond turtle

Several sites may contain suitable habitat for northwestern pond turtle, and they have been known to occur at sites 1-ASJ-1, 1-LYC, and 1-WAR-2.

V.7(a)-15. Work window: There is no work windows for this species; surveys may be required if maintenance activities will occur in potential pond turtle habitat. Prior to and during maintenance work, the following Avoidance and Minimization Measures shall be implemented; therefore project impacts will be mitigated to a less-than-significant level:

V.7(a)-16. Pre-construction surveys for northwestern pond turtles shall be conducted at these sites by a qualified biologist in accordance with USFWS protocols within 72 hours of the start of maintenance. The creek shall be surveyed for presence of turtles and the creek banks surveyed for presence of burrows; all locations of observed turtles and burrows shall be noted.

V.7(a)-17. Each day, before maintenance activities begin, the Environmental Compliance Coordinator (EEC) shall make a quick survey for turtles, paying close attention to areas where turtles or burrows had been noted during the pre-construction survey. If turtles are observed, the ECC shall assess the likelihood of project impacts to these species and coordinate findings with the USFWS and CDFG to ensure that appropriate protective measures are applied including hand removal or installation of fencing to avoid the area completely. At any time during maintenance activities, if a northwestern pond turtle is observed by the ECC, maintenance crew, or other knowledgeable persons, maintenance activities shall stop and the appropriate protective measures shall be applied including hand removal or installation of fencing to avoid the area completely.

V.7(a)-18. All staging areas for all heavy equipment, storage of materials, and any maintenance/fueling of heavy equipment shall be clearly identified in order to minimize impacts to upland habitats outside the project site.

V.7(a)-19. Training sessions shall be given to all workers to inform them of protective measures, instruct them in identification of northwestern pond turtles, their upland and aquatic habitat requirements, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

Avoidance and Minimization Measures for Birds

Following are avoidance and minimization measures for birds. Some of these relate directly to listed species with the potential to occur within one or more of the project sites (the rails, northern spotted owl); however, others relate more generally to a class of species, such as raptors and wading birds and land birds.

V.7(a)-20. Work window: At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start after July 31st potential impacts will be avoided and no surveys will be required. Because the culverts in the proposed project sites are fairly small, there is minimal likelihood that they would provide suitable habitat for swallows. However, if any culverts show evidence of past or current swallow nesting, the ECC shall identify them and maintenance activities shall occur after August 31 or after all swallows have fledged to avoid impacts.

V.7(a)-21. If work in the riparian zone will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until the young have left the nest and will no longer be impacted by the project.

BIRD-1: California Clapper Rail and California Black Rail

Several of the sites are within or immediately adjacent to suitable habitat for California clapper rail and California black rails (15-20 sites). The following avoidance and minimization measures apply to all sites within 250 feet of salt or brackish tidal marshland, which will also help to protect other marshland dependent species such as saltmarsh common yellowthroat and San Pablo song sparrow.

V.7(a)-22. Work window: The work window for maintenance activities within rail habitat is the non-nesting season of September 1st through January 31st. If maintenance activities are scheduled to ocur within the nesting season (February 1st to August 31st), the following Avoidance and Minimization Measures shall be implemented; therefore project impacts will be mitigated to a less-than-significant level:

V.7(a)-23. Work shall be scheduled to avoid periods of high tides, as the high water reduces the amount of refugial habitat for the rails.

V.7(a)-24. If maintenance activities are scheduled during the nesting season (February 1st to August 31st, a qualified biologist, in coordination with USFWS and/or CDFG, shall conduct a pre-construction survey within 5 days of the start of maintenance activities to check for nests and presence of the rails within the project sites. Additional surveys may be required including visual and/or call surveys to determine presence. A buffer zone of 250 feet from nests or occupied rail habitat shall be established and any activity within that buffer zone that has potential to disturb rails (i.e. high-decibel construction, pumping, use of heavy machinery, etc.) shall be rescheduled for later in the season once nesting has ended and the young have fledged (from September 1st through January 31st). If no nests are found but rails are present, the birds must be allowed to leave the area on their own before work can commence.

V.7(a)-25. When working within 250 feet of salt or brackish marshland, presence for either rail species shall be assumed; therefore, maintenance work in these areas shall be scheduled between September 1st and January 31st in any given year.

V.7(a)-26. Removal or disturbance of emergent tidal marsh vegetation shall be avoided, and removal or disturbance of vegetation at the tidal marsh/upland interface shall be avoided to provide a buffer of refugial habitat within as wide a swath as possible (3 meter minimum) from the Mean Higher High Water (MHHW) line. If maintenance or dredging activity does intrude into tidal marsh habitat, a qualified biologist shall survey the area prior to beginning work in order to determine the presence/absence of rails.

BIRD-2: Northern Spotted Owl

Per Department of Fish and Game Protocol for Surveying Proposed Management Activities that May Affect Northern Spotted Owls (2010), project sites are defined as the project footprint plus a .25 mi. radius buffer around it. Centers of northern spotted owl activity are located on Old Mill Creek, Cascade Creek, Warner Canyon Creek, Bothin Creek, Larkspur Creek, and Ross Creek and several of these documented locations fall within the .25 mi. buffer around several of the work sites: (3-OMC; 3-CAS; 3-WAR; 9-BOTH; 9-LAR-2; and 9-ROS).

V.7(a)-27. Work window: To avoid impacts to breeding northern spotted owls, maintenance activities identified as having potential impact on northern spotted owls or their habitat shall follow a limited operating period (LOP) with no work scheduled during the breeding season of February 1st through July 15th. If a biological evaluation conducted by a qualified biologist determines that vegetation projects are unlikely to result in breeding disturbance considering their intensity, duration, timing and specific location, or where a biological evaluation determines that topographic features may shield nest sites, the LOP may be waived or the buffer distance modified.

BIRD-3: Raptors and wading birds

Several of the sites are adjacent to suitable habitat for raptors and wading birds. Although none of these species are listed, they are protected by the Migratory Bird Act, and impacts to them shall be minimized.

V.7(a)-28. Work window: At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start outside of the nesting season (July 31 – January 31), then avoidance has been achieved and work can proceed. If maintenance activities are scheduled outside of the work window during the nesting season (Feb 1st- July 31st) then the following AMMs shall be followed:

V.7(a)-29. The ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until young have left the nest and will no longer be impacted by the project.

V.7(a)-30. During nesting season, (February 1st - September 1st), the ECC shall walk the area of proposed activity each day before maintenance activities begin to determine presence of nesting raptors and wading birds. If none are observed, avoidance can be assumed and work can proceed.

V.7(a)-31. At most sites with potential for raptor and migratory bird nesting, if work is conditioned to start after July 31st potential impacts will be avoided and no surveys will be required. However, if work in the riparian zone will occur between before July 31st the ECC shall conduct a survey for nesting birds within one week prior to the proposed vegetation removal and/or maintenance activities and ensure no nesting birds will be impacted by the project. Work can proceed if surveys determine that nesting birds will not be impacted or if no nesting birds are observed. If active nests are found, the ECC shall postpone maintenance activities for that site until young have left the nest and will no longer be impacted by the project.

BIRD-4: Landbirds

Many of the project sites are along riparian corridors that potentially support many passerine and non-passerine birds, some of which are seasonal and some of which are year-round residents. These project sites include: 1-NOV-3, 3-ACMP-3, 3-NYH-2, 5-EAS-2, 9-CMC-4, and many more. Any removal of trees or shrubs, or maintenance activities in the vicinity of active bird nests, could result in nest abandonment, nest failure, or

premature fledging. Destruction or disturbance of active nests would violate the federal Migratory Bird Treaty Act (MBTA) and California Department of Fish and Game (CDFG) Code.

V.7(a)-32. Work window: Avoidance will be achieved if maintenance activities are scheduled between August 1st to January 31st to avoid the nesting season (February 1st - July 31st). If maintenance activities are scheduled outside of the work window, then the following Avoidance and Minimization Measures shall be implemented:

V.7(a)-33. The removal of any trees or shrubs shall occur after August 1st, once the nesting season is complete. If removal of trees or shrubs occurs between February 1st and July 31st, a nesting bird survey shall be performed by a qualified biologist within 14 days prior to the removal or disturbance of potential nesting trees or shrubs. All trees with active nests shall be flagged and a non-disturbance buffer zone shall be established around the nesting tree, or the site shall be avoided until it has been determined that the young have fledged. Buffer zones typically range between 50-90 ft for passerines and non-passerine land birds. Active nests shall be monitored by a qualified biologist to determine when the young have fledged and are feeding on their own before work is allowed to begin.

V.7(a)-34. In addition to surveying trees and shrubs for nesting birds, surveys shall be conducted for ground nesting birds by walking narrow transects through the grassland adjacent to the project site within 14 days prior to the commencement of project related activities by a qualified biologist.

V.7(a)-35. The ECC shall be present at the commencement of maintenance-related activities to ensure that nesting birds and sensitive bird species have not inhabited the project site during the window following pre-construction surveys and commencement of maintenance activities. The ECC shall also survey all staging areas to ensure nesting and special status birds are not present.

V.7(a)-36. Training sessions shall be given to all workers to inform them of protective measures, instruct them in identification of sensitive habitat and bird species, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

Avoidance and Minimization Measures for Mammals

MAMM-1: Salt Marsh Harvest Mouse (SMHM)

Salt marsh harvest mouse is a federal and state listed endangered species although critical habitat has not been designated for this species. This species is found in saline emergent marsh vegetation with dense pickleweed. It is reported to occur within the project site in lower reaches of Novato Creek levees, Gallinas Creek South Fork, and Bothin Marsh sites. Approximately 15-20 sites are adjacent to suitable habitat for salt marsh harvest mouse; and about half of those sites include work where removal of pickleweed may impact salt marsh harvest mouse habitat. For these sites, the following AMMS should be followed:

V.7(a)-37. Work window: There are no seasonal work windows for this species since they breed year around,

V.7(a)-38 Work shall be scheduled to avoid periods of high tides, as the high water reduces the amount of refugial habitat for SMHM. Generally, work should not be scheduled to occur between two hours before high tide and two hours after high tide.

V.7(a)-39. If maintenance activities are conducted in potential SMHM habitat, a qualified biologist shall conduct a pre-construction survey within 5 days of the start of maintenance activities to determine the presence/absence of SMHM within and adjacent to the work area. Surveys shall follow USFWS protocols. In addition, a biological

monitor shall be present during maintenance-related activities within or adjacent to all suitable nesting habitat areas to ensure that salt marsh harvest mice are not present during operations.

V.7(a)-40. For sites where work includes removal of pickleweed, under the supervision of a qualified biologist and according to protocols established by Zedler (2001), vegetation shall be removed only with non-mechanized hand tools; no motorized equipment shall be used. Vegetation removal may begin only when no mice are observed, and shall start at the edge farthest from the salt marsh and work its way towards the salt marsh. If a mouse of any species is observed within an area where pickleweed is being removed, work shall stop and DFG shall be notified. Unless otherwise approved by DFG, the mouse shall be allowed to leave on its own volition.

V.7(a)-41. If trenching takes place within 50 ft of pickleweed areas, exclusionary fencing shall be installed around worksites before excavation begins, according to DFG specifications on size and placement of fencing. An escape ramp shall be placed in any open trench at the end of the day to allow any entrapped animals to escape.

V.7(a)-42. When implementing maintenance activities in upland areas adjacent to salt or brackish marshland, vehicles shall be confined to existing roads where possible, Crews shall use matting, pontoon boards or other comparable methods whenever feasible to minimize impacts to the existing vegetation. The placement of mats shall be verified by a qualified biologist before their placement to minimize habitat impacts. Crews shall work exclusively from mat boards and boardwalks to minimize trampling of vegetation.

V.7(a)-43. A biological monitor shall be on-site during all work activities within potential SMHM habitat, and will have the authority to halt project activities in order to comply with these terms. Training sessions shall be given to all workers to inform them of protective measures, instruct them in identification of the SMHM and its habitat requirements, and inform them of when work needs to be stopped and appropriate officials informed of species presence.

MAMM-2: Roosting Bats

V.7(a)-44. Work window: The work window for activities at sites where bats are determined to be present is from September 1st through January 31st. Impacts can be avoided by scheduling work, especially removal of trees and/or dense growths of ivy, after the breeding season ends on September 1st of any given year.

V.7(a)-45. Some of the sites may be within or adjacent to suitable habitat for roosting bats. If work is conducted outside of the work window, pre-construction surveys for signs of roosting bats shall be conducted concurrent with those for land birds. If surveys occur during the daytime, the biologist shall look for presence of bat droppings at likely roost sites (under bridges and trees (in layers of bark, woodpecker holes, and hollow branches). The droppings are black and small, about 4 – 8 mm long. Bat droppings crumble into powder when crushed, as they consist of insect remains (in contrast, mouse droppings are sticky when fresh and hard when old). During evening hours bats may be confirmed visually at dusk although species identification cannot be ascertained without the use of sonar recordings and specialized software. If no signs of bats are detected during the pre-construction surveys, avoidance has been achieved and maintenance activities can proceed.

V.7(a)-46. If bat guano was detected during the pre-construction survey, and removal of trees, shrubs, or dense ivy is scheduled to occur before September 1st, a qualified biologist shall conduct a roosting bat survey within 30 days prior to the removal or disturbance of potential nesting/roosting trees or shrubs. If bats are detected, work shall be re-scheduled for after the breeding season.

Avoidance and Minimization Measures for Plants

PLANT-1: Special Status Plants

Special-status plant species include those listed as Endangered, Threatened, Rare or those species proposed for listing by the USFWS (2001b), the CDFG (2010a,b) and the CNPS (2010). The CNPS listing is sanctioned by the CDFG and serves essentially as their list of "candidate" plant species. CNPS List 1B and List 2 species are considered eligible for state listing as endangered or threatened under the CDFG Code. Such species should be fully considered during preparation of environmental documents subject to the California Environmental Quality Act (CEQA). CNPS List 3 and List 4 species are considered to be either plants about which more information is needed or are uncommon enough that their status should be regularly monitored. Such plants may be eligible or may become eligible for state listing, and CNPS and CDFG recommend that these species be evaluated for consideration during the preparation of CEQA documents.

Based on quad searches and special status species listings from federal and state agencies searches, 33 plant species have been identified as having some potential of occurring within the project sites (Appendix A). Of these, only four species, based on literature and database reviews and familiarity with local flora, are considered likely to occur within the project sites. None are listed; all are species of concern. Based on a reconnaissance-level survey and habitat assessment, many of the 33 species with at least some potential to occur within the region can be ruled out from the work sites due to the lack of suitable habitat within the project corridor. Specialized habitats such as playas, coastal dunes, lower montane coniferous forest, vernal pools, coastal bluff scrub, coastal prairie, and serpentine-derived soils or outcrops are not present within the study area or work sites.

Although location data for several special-status plant species places them within the study corridor, the presence of some of these within the work sites remains highly unlikely. In many cases, the location data from CNDDB represent historic data from the time period before large-scale development. In other cases, the CNDDB data represent best guesses as to location, and while shown as covering the proposed project sites, the required habitat may not be present within the work sites.

The following four plant species are considered to have some potential to occur within one or more of the work sites, due to: 1) the presence of suitable habitat, 2) the plant was detected during the site reconnaissance, and/or 3) the species has been reported within the vicinity of the work sites.

1. ***Point Reyes bird's-beak (Cordylanthus maritimus ssp. Palustris;*** *STATUS. Point Reyes bird's beak is a federal species of special concern and is listed by the CNPS as 1B. PROJECT SITE OCCURRENCE The CNDDB lists 42 occurrences of Point Reyes bird's beak in Marin County; the majority of these are on the western coast. Sites near CNDDB occurrences include: 3-BM, 3-MIL-3, 3-RYC-1, 3-SUT-1.*

2. ***Pale Yellow/Hayfield tarplant*** (Hemizonia congesta ssp. congesta) *STATUS. The pale yellow tarplant is not listed by the federal or state governments but is listed by the CNPS as 1B. PROJECT SITE OCCURRENCE. The CNDDB lists a record in Ignacio near sites 1-ASJ-1, 1-ASJ-2, and 1-ASJ-3.*

3. ***Marsh microseris (Microseris paludosa)*** *STATUS. The marsh microseris is not listed by the federal or state governments but is listed by the CNPS as 1B.PROJECT SITE OCCURRENCE. The CNDDB lists occurrences in the vicinity of sites: 3-CAS, 3-ACMP-3, and 9-LAR-2.*

4. Marin knotweed (*Polygonum marinense*) *STATUS. Marin knotweed is a federal species of special concern and is listed by the CNPS as 3 (needing taxonomic review). PROJECT SITE OCCURRENCE. The CNDDB contains record for Marin knotweed on Corte Madera Creek, just downstream of site 9-CMC-1 and at the creek mouth.*

The following mitigations developed for treatment of special status plants and their habitats shall be adhered to during project implementation; therefore impacts to these species will be less-than-significant:

V.7(a)-47. Work window: There are no work windows for the plant special status species; surveys may be required if species may be impacted.

V.7(a)-48. At sites where vegetation may be modified (such as mowing, clearing, or ground-breaking), and where special status plant species may potentially occur, a qualified biologist should conduct a habitat assessment during blooming periods to determine the presence of suitable habitat. If no potentially suitable habitat is identified during the habitat assessment, then avoidance has been accomplished and no further actions are necessary.

V.7(a)-49. If suitable habitat is determined to be present within the maintenance site, botanical surveys should be conducted before activities commence to determine whether any special status plant species are present. Rare plant surveys, if necessary, should be conducted following the Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities (CDFG 2009b) and Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed and Candidate Plants (U.S. Fish and Wildlife Service 2000). Surveys should be conducted in the field when species are both evident and identifiable, normally during flowering or fruiting. Multiple visits to a site may be necessary to capture the floristic diversity present at the site.

V.7(a)-50. If listed species are observed or presumed present, then the ECC should take such action as is necessary to protect the plants, using fencing, buffers, etc. If possible and practicable, the project should be redesigned to avoid listed plant species.

V.7(a)-51. For all observed special status species, the ECC should complete and submit a California Native Species (or Community) Field Survey Form to the CNDDB documenting the species and location. The ECC shall ensure that the Project Foreman is aware of these site-specific conditions, and shall inspect the work site before, during, and after completion of the maintenance activities.

MITIGATION MONITORING MEASURES

V.7 (a)-1-51. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

b)	**Substantial change in the diversity, number, or habitat of any species of plants or animals currently present or likely to occur at any time throughout the year? (source #(s):** 3, 4)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

The ECC shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed.
As a precaution against invasive quagga and zebra mussels, if kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary.

All construction activities for the project would be completed in a fashion that minimizes disturbance to existing riparian and aquatic habitat. The proposed removal of riparian vegetation is the absolute minimum necessary to provide access for maintenance equipment, restore the natural flow regime, provide flood protection, and minimize loss of riparian trees. Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program.

Avoidance and minimization measures prescribed for each activity at each site have been established and shall be implemented to ensure that animals inhabiting the project area. The following mitigation measures are proposed to avoid and minimize changes in the diversity, number, or habitat of any species of plants or animals currently present or likely to occur on the project site and would decrease the risk of impacts to a level of less than significant.

MITIGATION MEASURES

V.7(b)-1. DPW shall minimize any riparian tree removal in order to preserve habitat quality. Removal of native riparian vegetation shall be limited to that necessary for equipment access and flood control (e.g., removing fallen trees in channels).

V.7 (b)-2. An Environmental Compliance Coordinator (ECC) shall be designated for all maintenance activities. The ECC shall have an understanding of biological resources, missions of regulatory agencies and regulations as they may affect listed species, and the nature of the maintenance activities. Before commencement of a maintenance activity, the ECC shall review the individual project fact sheets containing project specific information on the type, location, and extent of the activity and associated areas of disturbance. S/he shall determine appropriate measures to implement, based on the type of activity, and shall prescribe appropriate avoidance and minimization measures and general and activity-specific conditions and prohibitions.

V. 7 (b)-3. All prescribed General Conditions and Avoidance and Minimization Measures, as described above and documented in the Project Fact Sheets for each project site, shall be adhered to during pre-project planning, implementation and post-project clean-up.

V. 7 (b)-4. The ECC shall ensure that the Project Foreman is aware of any site-specific conditions and avoidance and minimization measure prescribed for the activity at each site, and shall inspect the work site before, during, and after completion of the maintenance activities.

MITIGATION MONITORING MEASURES

V.7(b)-1. The District shall verify that these Mitigation Measures comply with mitigation standards and have been properly implemented.

c) Introduction of new species of plants or animals into an area, or improvements or alterations that would result in a barrier to the migration, dispersal or movement of animals? (source #(s): 3, 4)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [X]	**Less Than Significant Impact** [ ]	**Not Applicable** [ ]

The ECC shall ensure that the spread or introduction of invasive exotic plants shall be avoided to the maximum extent possible. When practicable, invasive exotic plants at the work site shall be removed. As a precaution against invasive quagga and zebra mussels, if kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary. Exotic plants are often introduced by seed banks contained in imported fill or mud that is caked onto construction equipment that moves from site to site. The District shall not bring any fill to project sites. Invasive plants can also be introduced by seeds contained in hydro-seed mixes or hay products. Therefore, sediment and erosion control measures shall avoid using these products and use only weed-free rice straw or other similar products for erosion control.

Removal of non-native vegetation takes place as part of channel maintenance but also occurs as a restoration activity with the STRAW Program (Students and Teachers Restoring a Watershed Program) project in collaboration with the County of Marin Stormwater Pollution Prevention Program (MCSTOPPP). Re-vegetation activities generally occur after other maintenance work has occurred or in conjunction with STRAW's annual stream restoration program.

The ability of wildlife to move through the landscape is important for migration (seasonal breeding and feeding), dispersal (new home ranges and long-term genetic exchange), and for daily movement within individual territories. Habitat fragmentation creates a greater number of habitat patches that are smaller in size than the original contiguous habitat. This, in turn, can hinder regional wildlife movements, put stress on local populations, and increase the probability of extinction for these populations compared to those associated with non-fragmented landscapes. Considering the impacts resulting in potential fragmentation of primary habitat types and loss of valuable dispersal corridors is important when assessing the biological impacts of a project. Because the activities proposed do not involve the permanent loss of wetland and/or riparian habitat within the work sites, they are not likely to affect wildlife movement corridors or contribute to habitat fragmentation. Given that the proposed work is maintenance-related, the project will likely only result in short-term temporal impacts (1-2 days) to movement for aquatic species dependent the subject habitats. Movement through these areas will be restored as soon as maintenance activities are completed.

Removal of excessive sediment should help to open the channel and enhance opportunities for resident and migratory fish and other aquatic species to move freely to suitable upstream and downstream habitats. Re-colonization of on-site native wetland vegetation communities to their previous condition will occur naturally. Implementation of the following mitigation measures would decrease the risk of impacts caused by the accidental introduction of new species of plants or animals into the project area to a level of less than significant.

MITIGATION MEASURES

V.7(c)-1. The District shall prevent the unintentional introduction of new species of plants or animals into the project area by a wash down of all equipment prior to transporting it to project sites in order to eliminate mud that may harbor exotic plant species and animals.

V.7(c)-2. The District shall not import fill to project sites.

V.7(c)-3. The District shall only use straw wattles that contain weed-free rice straw and shall not use hydro-seeding or seeded hay products.

V.7(c)-4. If kayaks or any other vessels are used in maintenance activities, crew shall wash and dry them off-site prior to using them in another creek or tributary.

MITIGATION MONITORING MEASURES

V.7(c)-1-4. District staff shall verify that these Mitigation Measures have been properly implemented.

8. ENERGY AND NATURAL RESOURCES. ***Would the proposal result in:***

a) Substantial increase in demand for existing energy sources, or conflict with adopted policies or standards for energy use? (source #(s): 1)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Due to the maintenance nature of the project, no increase in demand for existing energy sources or standards for energy use will be affected. Therefore, this is a less-than-significant impact.

b) Use of non-renewable resources in a wasteful and inefficient manner? (source #(s): 1)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The project is maintenance in nature and implementation will require very little use of non-renewable natural resources, however some fuel will be spent on equipment usage, although the impact of this usage would create a less-than-significant impact.

c) Loss of significant mineral resource sites designated in the Countywide Plan from premature development or other land uses which are incompatible with mineral extraction? (source #(s): 1)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No significant mineral resources are found on the project site, therefore, this is a less-than-significant impact.

9. HAZARDS. ***Would the proposal involve:***

a) A risk of accidental explosion or release of hazardous substances including, but not necessarily limited to: 1) oil, pesticides; 2) chemicals; or 3) radiation)? (source #(s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

Best Management Practices, including those covering Chemical Use shall be employed to prevent or reduce the risk from, or impacts from, the accidental discharge of chemicals from vehicles operating at the project sites. Therefore, this is a less-than-significant impact.

b) **Possible interference with an emergency response plan or emergency evacuation plan? (source #(s): 3, 4).**	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The sediment removal activities shall not interfere with an emergency response or evacuation plan. In the case of an emergency, all heavy equipment shall immediately be removed from the roadway in order to allow vehicles to enter the area. Heavy equipment deployed at the project site can be removed in a matter of a few minutes during an emergency or evacuation. Therefore, this is a less-than-significant impact.

c) **The creation of any health hazard or potential health hazard? (source #(s): 3)**	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The implementation of routine maintenance activities will not create any potential health hazards; therefore, this is a less-than-significant impact.

d) **Exposure of people to existing sources of potential health hazards? (source #(s): 3)**	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The removal of sediment from the creeks and channels and replanting streamsides with native vegetation will not expose people to existing sources of health hazards; therefore, this is a less-than-significant impact.

e) **Increased fire hazard in areas with flammable brush, grass, or trees? (source #(s): 3)**	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

One of the primary goals of vegetation management is to reduce fire fuels lading and the potential for fire hazards. Fire fuel reduction is achieved by mowing on tops of banks and levees, removal of fallen trees, removal of standing dead trees, and thinning and removal of non-native species such as ivy and Himalayan blackberry. For mowing, crews use weed-eaters for smaller areas and tractors with mowing attachments for larger, more open areas. Therefore the proposed project will have a positive effect on reducing fire hazards, therefore this is a less-than-significant impact.

10. NOISE. ***Would the proposal result in:***

a) **Substantial increases in existing ambient noise levels?** **(source #(s):** 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

There will be a temporary increase in ambient noise levels during normal working hours if heavy equipment (e.g. backhoe or excavator) is used to remove sediment from the creeks, channels and drainage ditches. The duration of the impacts will be short, typically a few days, depending on the site, and the noise level will be comparable to noise generated during typical routine maintenance activities conducted by public works or flood control districts. The noise impact be limited to typical day time construction hours between 7 a.m. and 5 p.m., therefore, this is a less-than-significant impact.

b) **Exposure of people to significant noise levels, or conflicts with adopted noise policies or standards?** **(source #(s):** 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

There will be an increase of noise levels during implementation of maintenance activities but only for a temporary time as with any maintenance project. Any increase in noise levels from construction equipment on private property will occur where landowners have given prior permission for maintenance activities to occur. The increase in maintenance related noise levels would only occur during weekdays, from approximately 8:00 a.m. to 4:00 p.m. This is consistent with the County's adopted noise policy from 7am-6pm, Mon.-Fri. and not on holidays. Therefore, this is a less-than-significant impact.

11. **PUBLIC SERVICES.** ***Would the proposal have an effect upon, or result in a need for new or altered government service in any of the following areas:***

a) **Fire protection?** **(source #(s):** 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The fire fuels reduction aspect of the project is designed to reduce the risk of fire along grassy levees and upper stream banks. Mowing is scheduled to be completed before the Fourth of July holiday as an added measure to prevent fires related to holiday fireworks. The project does not include a demand for additional fire protection services; therefore, this is a less-than-significant impact.

b) **Police protection?** **(source #(s)** 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The sediment removal maintenance project will not have an effect on police protection; therefore, this is a less-than-significant impact.

c) **Schools?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

Project implementation will not result in dangerous design features or incompatible uses with schools; therefore this be a less than significant impact.

d) **Maintenance of public facilities, including roads?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

A primary goal of the proposed RMA program is to perform maintenance operations on County flood control channels and related infrastructure, including levees, tide gates, pump stations and trash racks. The objective of maintaining this infrastructure is to reduce the risk of potential flooding and consequential adverse impacts on other infrastructure including adjacent buildings and roads. The project itself will provide additional government services to protect people and infrastructure from flooding and will benefit the maintenance of public facilities; therefore this is a less-than-significant impact.

e) **Other governmental services?** (source #(s): 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

The RMA program does not create an increased demand for additional services but rather the project will increase governmental services by providing greater flood control protection through routine maintenance of flood control channels and related infrastructure, including levees, tide gates, pump stations and trash racks. Regular routine maintenance of facilities will reduce the risk of potential flooding and consequential adverse impacts on other infrastructure including adjacent buildings and roads. This in turn will decrease the need for emergency government services during high storm flows; therefore, this is a less-than-significant impact.

12. **UTILITIES AND SERVICE SYSTEMS.** ***Would the proposal result in a need for new systems, or substantial alterations to the following utilities:***

a) **Power or natural gas?** (source # (s): 1, 3)	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
	[ ]	[ ]	[X]	[ ]

No alterations to power or natural gas will be required for the maintenance project; therefore, this is a less-than-significant impact.

b) **Communications systems?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to communications systems will be required by the maintenance project; therefore, this is a less-than-significant impact.

c) **Local or regional water treatment or distribution facilities?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to water treatment or distribution will be required by the maintenance project; therefore, this is a less-than-significant impact.

d) **Sewer or septic tanks?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to sewer or septic tanks will be required by the maintenance project, therefore, this is a less-than-significant impact.

e) **Storm water drainage?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

The flood control routine maintenance activities proposed in this project will have a positive affect on the function of flood control channels and streams to carry and conduct stormwater run-off. Limited removal of obstructing vegetation and excavation of sediment deposits will increase channel function and decrease the potential risk of flooding. The regular maintenance of tide gates and trash racks will increase the ability of storm flows to travel through stream channels. The project's objective is to maintain channel function, especially during peak storm events; therefore, this is a less-than-significant impact.

f) **Solid waste disposal?** (source # (s): 1, 3)	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[ ]	[X]	[ ]

No alterations to solid waste disposal will be required by the maintenance project; therefore, this is a less-than-significant impact.

13. AESTHETICS/VISUAL RESOURCES. ***Would the proposal:***

a) Substantially reduce, obstruct, or degrade a scenic vista open to the public or scenic highway, or conflict with adopted aesthetic or visual policies or standards? (source # (s): 1, 3)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [ ]	**Less Than Significant Impact** [X]	**Not Applicable** [ ]

No alterations to scenic vistas will result from the maintenance project. The project would minimize potential impacts to sensitive habitats at the project sites and would be designed to blend into the surrounding natural environment to the greatest extent feasible. Some trimming of riparian trees will occur, but the project would not change the riparian character of the project sites. The projects would not obstruct or alter the visual character of the project sites or result in visual impacts to public or scenic views and vistas from adjacent roadways. Because this is a flood control maintenance project that does not result in any permanent structures and is temporary in nature, project activities would not adversely affect views, light or privacy of private properties. Therefore, this is a less-than-significant impact.

b) Have a demonstrable negative aesthetic effect by causing a substantial alteration of the existing visual resources including, but not necessarily limited to: 1) an abrupt transition in land use; 2) disharmony with adjacent uses because of height, bulk or massing of structures; or 3) cast of a substantial amount of light, glare, or shadow? **(source #(s):** 1, 3)	**Significant Impact** [ ]	**Potentially Significant Unless Mitigated** [ ]	**Less Than Significant Impact** [X]	**Not Applicable** [ ]

No alterations to visual resources will result from the project. The project would minimize potential impacts to sensitive habitats at the project site and would be designed to blend into the surrounding natural environment to the greatest extent feasible. Some removal and trimming of riparian trees will occur, but the project would not change the riparian character of the sites. The projects would not obstruct or alter the visual character of the sites or result in visual impacts to public or scenic views and vistas from adjacent roadways. Because this is a flood control maintenance program that does not result in any permanent structures, project activities would not adversely affect views, light or privacy of private properties. Therefore, this is a less-than-significant impact.

14. CULTURAL RESOURCES. ***Would the proposal:***

a) **Disturb paleontological, archaeological, or historical sites, objects, or structures? (source #(s): 1, 3)**	**Significant Impact**	**Potentially Significant Unless Mitigated**	**Less Than Significant Impact**	**Not Applicable**
	[ ]	[X]	[ ]	[ ]

The proposed project will disturb only aggraded sediment that has been carried from the upper watershed down through the stream and channel system, and many sites where sediment is to be removed have previously been dredged multiple times in the same locations. No historic structures will be impacted by the proposed routine maintenance project since no work is planned to be completed on any structures other than maintenance facilities including weirs, gates, tidegates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, utility line crossings, culverts, outfalls, stormdrain or pump station inlet/outlet structures and similar structures. Although no human remains or archaeological resources are known to occur within the proposed project sites or in the immediate vicinity, it is possible that there may be undiscovered archaeological resources buried at the sites due to their location in a high sensitive area. Such resources could be discovered during proposed sediment removal on the site, making this a potentially significant impact.

The following mitigation measures would reduce potential impacts to less than significant by detailing a course of action in the unlikely event that archaeological resources or human remains are encountered during construction activities.

MITIGATION MEASURES

V.14(a)-1. In the event that any human remains, artifacts, or other indicators of prehistoric or historic use of the parcel are encountered during site preparations or construction activities on any part of the project sites, all work at the vicinity of the discovery site shall be halted immediately. A registered archaeologist, chosen by the County in consultation with the Federated Indians of Graton Rancheria and paid for by the District, shall assess the site and submit a written evaluation recommending appropriate actions to take to protect the site and the resources discovered, including monitoring of all subsequent work at the site by a Native American monitor from the Federated Indians of Graton Rancheria or other designated tribal representative. If human remains are encountered, the County Coroner must also be contacted and State law designates procedures to follow in the event that human remains are encountered. If the remains are deemed to be Native American and prehistoric, the Coroner must contact the Native American Heritage Commission so that a "Most Likely Descendent" can be designated. No work at the site may recommence without approval of the District. If it is determined that a prehistoric site exists, the following shall be implemented:

(a) No future development activity shall take place at or in close proximity to the prehistoric site within the development area;

(b) The historical site(s) shall be filled to protect the resources there;

(c) No additional excavation shall occur at these locations other than to remove surface organic material; and

(d) The District may be required to submit a revised project to protect the resource(s). No further work at the site may recommence without approval of the Department of Public Works Director. All

future development of the site must be consistent with findings and recommendations of an archaeological assessment prepared for the site by a registered archaeologist, as approved by the CDA staff.

MITIGATION MONITORING MEASURES

V.14(a)-1. In the event of discovery, DPW staff shall verify that a report has been submitted and all construction work has been stopped. In the event that the report indicates that any human remains, artifacts, or other indicators of prehistoric or historic use of the parcel are encountered during site preparation or construction activities on any part of the project site, DPW staff shall verify that a registered archaeologist has been retained to assess the site and has submitted a written evaluation to DPW advancing appropriate conditions to protect the site and the resources discovered before work commences on the site. If human remains are encountered, DPW staff shall verify that the County Coroner has been contacted and that all future work is carried out in accordance with the mitigation measures.

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
b) Have the potential to cause a physical change which would adversely affect unique ethnic cultural values, or religious or sacred uses within the project area? (source #(s): 1, 3)	[ ]	[ ]	[X]	[ ]

No known ethnic, religious or sacred uses are known to exist on or near the project sites. As noted above, the only structures included in the project description are maintenance facilities including weirs, gates, tidegates, diversion structures, trash racks, stream gauge structures, grade control structures, energy dissipaters, utility line crossings, culverts, outfalls, stormdrain or pump station inlet/outlet structures and similar structures. No other structures are involved. Accordingly, the proposed maintenance project would not have a significant impact on unique ethnic, cultural or religious uses or structures.

15. **SOCIAL AND ECONOMIC EFFECTS.** ***Would the proposal result in:***

	Significant Impact	Potentially Significant Unless Mitigated	Less Than Significant Impact	Not Applicable
Any physical changes which can be traced through a chain of cause and effect to social or economic impacts. (source #(s): 1, 3)	[ ]	[ ]	[X]	[ ]

The maintenance project will not result in any known physical changes to social or economic entities. Therefore, this is a less-than-significant impact.

VI. **MANDATORY FINDINGS OF SIGNIFICANCE.** Pursuant to Section 15065 of the State EIR Guidelines, a project shall be found to have a significant effect on the environment if any of the following are true:
(Please explain your answer after each question

		Yes	No	Maybe
a)	Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
b)	Does the project have the potential to achieve short-term, to the disadvantage of long-term, environmental goals? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]
c)	Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects). *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project and the entire maintenance program would be mitigated to a level of insignificance. Therefore, this project has no cumulatively considerable effects. See Attachment B for assessment of cumulative impacts and mitigation measures associated with the overall maintenance program at 47 culvert/drainage sites in West Marin.*	[ ]	[X]	[ ]
d)	Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly? *As described in Section V of this Initial Study, any potential environmental impacts from the proposed project would be mitigated to a level of insignificance.*	[ ]	[X]	[ ]

VII. PROJECT SPONSER'S INCORPORATION OF MITIGATION MEASURES:

Acting on behalf of the project sponsor or the authorized agent of the project sponsor, I (undersigned) have reviewed the Initial Study for the Marin County Flood Control and Water Conservation District's Routine Maintenance Activities Program (RMA), and have particularly reviewed the mitigation measures and monitoring programs identified herein. I accept the findings of the Initial Study, including the recommended mitigation measures, and hereby agree to modify the proposed project application now on file with Marin County to include and incorporate all mitigation measures and monitoring programs set out in this Initial Study.

For _____ 2/16/2012 _____

Robert Beaumont; Director Date

VII. DETERMINATION: Pursuant to Sections 15081 and 15070 of the State Guidelines, the foregoing Initial Study evaluation, and the entire administrative record for the project:

[ ] I find that the proposed project WILL NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.

[X] I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because the mitigation measures described on an attached sheet have been added to the project. A NEGATIVE DECLARATION will be prepared.

[ ] I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.

Signature _____ Date 2/16/12

Printed Name Rachel Warner Date 2/16/12

ATTACHMENT A

MAPS OF PROJECT AREAS AND SPECIAL STATUS SPECIES

Please see Appendix C in Programmatic Approach to Routine Maintenance Activities document for the maps.

ATTACHMENT B
MASTER LIST OF MAINTENANCE SITES

Please see Appendix A in Programmatic Approach to Routine Maintenance Activities document for the maps.

ATTACHMENT C

MASTER LIST OF SEDIMENT REMOVAL SITES

Please see Appendix B in Programmatic Approach to Routine Maintenance Activities document for the maps.